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A Foucauldian Genealogical Analysis of Backward Design

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Master of Science in Education; Bachelor of Arts

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University of Glasgow

Under the supervision of Dr. Fiona Patrick

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Abstract

The aim of this research was to understand how “backward design” emerged to shape the beliefs, attitudes, and practice of educators. Using Foucauldian genealogical analysis, this study looks at key educational figures and movements in the United States (Ralph W. Tyler, Hilda Taba, and Grant Wiggins and Jay McTighe) to trace the ideas and practices that have shaped the curriculum process of backward design. Their seminal works are historized in relation to the economic, social, and political power dynamics that were a feature of their respective eras. Historizing their work aids in uncovering the sometimes incompatible conceptualizations of learning underlying backward design and how these conceptualizations reshaped behaviorist objectives-based curriculum design in response to social, economic, and/or political problems that education was tasked to solve.

Through the genealogical method, the rationality of the conceptualization of backward design, and previous iterations of it, are called into question and the subjugated knowledges and practices underlying these conceptualizations are unearthed. Bringing these subjugated knowledges and practices to the surface, uncovers the episteme many teachers are currently functioning within. The unearthing enables us to resist the dominance of backward design and consider alternative ways to frame our understanding of learning, assessment, and curriculum making. Genealogy shows that approaches to curriculum design, learning, teaching and assessment, were not always done this way, and so do not have to be done this way.

This research contributes to understanding how Foucauldian genealogy can be used as a research methodology. It also contributes to understanding how educational developments come into being, challenging ideas of linear progression and conceptual purity. Finally, this research contributes to educational theory by exploring theorists as the point of analysis of power. This study sees educational theorists as agents within a regime of truth that reorganizes existing knowledges to conform to the episteme of their time.

Dedication

To my beloved children, Livia and Liam,

As I close this chapter in my life, I dedicate this work to you both. This dissertation not only represents the culmination of my academic pursuits, but also my dedication in providing you with a foundation for your own journeys in life.

May the complexities of life forever drive your curiosity and intellectual pursuits.

Our family, Munchie, baby Liam/Eliot, and Bear, mean the world to me.

The three of you fill my heart with love and hope.

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My late aunt, Dr. Leticia Asuzano, who was the matriarch of the family. Her educational pursuits, intelligence, and ambition paved the way for the completion of this doctoral dissertation.

Finally, my husband Dr. Romain Deguest. His unwavering support throughout all the challenges I faced in this journey is the bedrock on which this dissertation stands. He helped make this journey academically enriching and personally fulfilling. I am incredibly fortunate to have him by my side.

Author's Declaration

I declare that, except where explicit reference is made to the contribution of others, that this dissertation is the result of my own work and has not been submitted for any other degree at the University of Glasgow or any other institution.

Elizabeth M. Tomacruz

Chapter 1: Introduction

Aims of this research

The purpose of this research was to conduct a Foucauldian genealogical analysis of backward design. This is an outcomes-based approach to curriculum design most recently articulated by Wiggins and McTighe (1998) in their book *Understanding by Design* (UbD). The purpose of using genealogy was to bring to the surface the ways in which backward design has emerged as an influence on curriculum design and teacher practice in the United States and beyond. This research untangles the knowledges and practices behind the “regime of truth” that is outcomes-based learning by tracing the development of learning and curriculum-making through the work of key figures and the educational movements associated with their theories. The key theorists in this genealogy are Ralph W. Tyler, Hilda Taba, and Grant Wiggins and Jay McTighe. I historicize and analyze their work in relation to the economic, social, and political power dynamics that developed during their respective eras. Historicizing their work aids in the untangling of the “regime of truth” (Foucault, 1980, p. 131) of outcomes-based learning by exploring and challenging the ways in which this way of thinking about learning became validated. The ideas that formed outcomes-based learning and backward design were shaped and reshaped in response to educational, social and economic problems and needs that arose in the different eras. This research also traces the positioning of teachers as ideas about the *science* of education were being developed by theorists and experts around them.

Research motivation

Rather than finding self-assurance and confidence in my identity and practice as an educator over time, I become more conflicted and hesitant as my career developed. Something did not seem right. I started my career in education through an alternative certification program called the New York City Teaching Fellows. This program recruited recent graduates with high potential to train as teachers with a view to reducing the various achievement gaps in New York City (NYC) public schools. I was given 2-months preservice teacher training during the summer and, in September, I was teaching English and US History to special education students. It was during this time that I was first introduced to backward design as it was taught to me in my preservice training and its three-step process: (1) identify desired results (2) determine acceptable evidence (3) plan learning experiences and instruction

The school I taught in was a transfer high school: a last chance secondary school for students to obtain their high school degree. The students came to us because they had previously dropped out of school or had fallen behind in their school progression. The reasons for this ranged from students having gone to jail, having tumultuous family lives, having learning and emotional disabilities, or simply experiencing an overall disengagement with schooling. Transfer high schools were classified as high needs schools and so received more funding. However, funding was also contingent on the graduation of students.

Since the objective of the school was to graduate as many students as possible, every class was geared towards students earning course credits and passing the New York Regents Exams. Regents are standardized state examinations in Mathematics, English, US History, World History, and Science which students needed to gain in order to graduate. Even though all classes were geared towards the Regents Exams, teachers were still asked to post daily lesson plans that were linked to the NY State Standards. Backward design gave a clear roadmap as to how this could be achieved. I found the first two elements of backward design more straightforward to understand: (1) the desired results were the NY State Standards; (2) the acceptable evidence was the Regents Exams. However, step 3, planning of learning experiences and instruction was more difficult in terms of knowing what to teach. I reviewed past Regents Exams over a 10 year period, and organized the questions into themes and skills, and taught content accordingly. I focused content on the material that was most likely to appear in the exams. The class activities I chose replicated the types of questions that would appear on the exam: multiple choice, compare and contrast essays, position essays, and so on. I had a high pass rate for my students, but I was doubtful about what they really learned and how beneficial obtaining a high school diploma was for them in terms of learning.

After two years in NYC, I moved to France and worked in the French higher education system, specifically *Grandes Ecoles* (GE) Business schools. My job title was a *pedagogical engineer*. A pedagogical engineer works with professors in creating online courses as well as providing consultations to professors to improve course pedagogy. At first, I was reluctant to give advice in pedagogy to professors that had been teaching far longer than I had. However, the more I learned about the French higher education system, the more I saw where I could have value.

French business schools, to be globally competitive and have global legitimacy, need to have international accreditations. The triple crown accreditations for business schools are the Association to Advance Collegiate Schools of Business (AACSB) in the United States, the Association of MBAs in the United Kingdom (AMBA), and the EFMD Quality Improvement System (EQUIS) in the European Union. When I saw what was expected of

the curriculum development from these accreditation institutions, the formula that was ingrained in my being in NYC was activated. I was again in very familiar waters: standards, assessments, activities.

The major difference between my experience in France and New York City was the level of buy-in to this system of teaching. In NYC, most of the novice teachers, less than 5 years' experience, understood the backward design formula and worked with it. The school administration pushed this form of curriculum making, and one could feel that those who resisted would eventually be submerged by the backward design wave. In France, the business school administration spoke of its importance and tried to implement some administrative tools to provide evidence of its implementation to accrediting institutions. Apart from that, there was no real surveillance of, or accountability in, its use. When I first started discussing accreditation standards, the Bologna process, learning outcomes, and assessments I was often met with blank stares. I wondered why this approach and its importance for accreditation was so difficult for the professors to accept and understand. Reflecting on this, I believe it was because the French professors did not see this as an approach to learning and pedagogy, but as an administrative task they needed to comply with. For them, it was an administrative task because it historically was never part of their culture of teaching, particularly in the elite *Grandes Ecoles*. In *The State Nobility* (1996) Pierre Bourdieu discusses how preparatory schools in France train students to pass the difficult national exams, the *concours*, for admittance into the *Grandes Ecoles*. The *concours* test students on multiple disciplines such as mathematics, science, arts, and philosophy. Students are expected to know the totality of the discipline as it is represented in the school curriculum as what they may be tested on is unknown (Van Zanten & Maxwell, 2015). This form of training uses academic disciplines as a means to an end. The end being that this form of training mimics the “working environment they will encounter when they take up their administrative and political elite positions” (Van Zanten & Maxwell, 2015, p. 76) Knowing this about the French GE system, I was able to understand better why French professors in this system saw outcomes-based learning as “administration.” Although they couldn't articulate their reasoning for pedagogic choices relating to teaching and learning, they knew that outcomes-based learning was not part of **their** reasoning for teaching the way that they did. I therefore wondered how I might best help professors understand this logic of teaching and learning.

I reflected to my NYC teaching days and remembered backward design. We were taught this method to help us complete our lesson plan templates and curriculum maps. But I was a bit wary in bringing this method into a higher education setting, but as I was

researching backward design, I saw that this method was being promoted in higher education in the United States. The Centers for Teaching and Learning in Harvard¹, Columbia², Yale³, and many other top universities were promoting backward design as an approach to curriculum making and learning. Furthermore, Coursera⁴, the online learning platform that has partnered with hundreds of universities around the world, also use backward design in their course planning process. However, I worried that the French, who pride themselves in their philosophical traditions, particularly Cartesian logic, would find backward design too facile, too deterministic, and too American. But more importantly, I was beginning to question the merits of backward design, or rather I was beginning to see the merits of other forms of learning.

I reflected on my experience as a university student, and I was brought back in time as I wrote this reflection:

We were rounding midnight, and I was ready to move faster. I was with three other classmates studying for my first mid-term exam in Art History. In the beginning I was working with them, testing them with flashcards about the different art movements, explaining the specific characteristics that they needed to keep in mind for each movement. I was hoping that these broad brushstrokes would help them frame their understanding. But they were moving too slow for me. I sensed an urgency inside me that needed to be addressed. I had already started reviewing the artwork that we had covered, and there was what felt like hundreds to get through and I was ready to devour them. With each image that I saw, I was mentally categorizing them. Reciting in my head what movement they belonged to based on their overall composition, subcategorizing them based on specificities of artists, then going back and reminding myself of the history around these works of art. What were the major events and political movements that influenced these artists and how did that show in their paintings? Who had the wealth to commission works of art and why was it important for them to have these artifacts made? Who were these individual artists and what was so unique about their vision and ability, that we, hundreds of years later, are left studying them?

¹ <https://bokcenter.harvard.edu/backward-design>

² <https://ctl.columbia.edu/faculty/offerings/seminars-institutes-for-faculty/course-design/>

³ <https://poorvucenter.yale.edu/BackwardDesign>

⁴ <https://www.youtube.com/watch?v=VuRkRCBo91Q>

My brain was on fire when I took that exam, and I walked out of that room knowing that this was my major. I spent so many hours in dimly lit classrooms, looking at slideshow projections, listening to lectures about paintings, sculptures, artists, and architects - waiting to hear the click of the carousel projector in anticipation for the next image. So many nights spent in the basement of the art history library, poring over 35mm slides, deciphering images, so my brain could do what it did best: memorize, sort, determine, judge, compare, analyze, categorize and ultimately criticize works of art.

Reflecting on this piece of writing made me realize that I learned, and learned well, without knowing objectives or assessments and activities directly linked them. I learned through the inherent forms of knowledge that are found in the study of art history. I assumed that this was the same for other disciplines. I could not let go of the tension between how I was taught to teach using objectives and then backward design, versus how I learned. Because of this, I had a very hard time finding credibility in counselling others on how to teach.

Methodology (an aperçu) and research questions

When I started learning about post-modernism, the lens through which I saw the world of learning started to make better sense. Challenging grand narratives made sense. I was particularly intrigued by Michel Foucault's work, particularly his concept of "regimes of truth." According to Foucault, truth

is a thing of this world: it is produced only by virtue of multiple forms of constraint. And it induces regular effects of power. Each society has its regime of truth, its 'general politics' of truth: that is, the types of discourse which it accepts and makes function as true; the mechanisms and instances which enable one to distinguish true and false statements, the means by which each is sanctioned; the techniques and procedures accorded value in the acquisition of truth; the status of those who are charged with saying what counts as true. (Foucault, 1980, p. 131)

Foucault's idea of "regimes of truth" resonated with me because it explained for me why having a normative approach, such as backward design, or even a normative ideology, such as objectives-based learning, did not work uniformly for the different educational environments I found myself in. My reading of Foucault suggests that truth is not something that can be obtained because it is something that is constructed. Truth is relative to the society

that has created it. It is created by individuals exercising power within society through a variety of apparatuses such as - but not limited to - political, institutional, commercial, behavioral, and philosophical entities.

From reading Foucault, I then became interested in genealogy as a method of exploring regimes of truth. According to Colin Koopman, genealogies

articulate problems [and]...are concerned...with submerged problems. The problems of genealogy are those problems found below the surfaces of our lives- the problems whose itches feel impenetrable, whose remedies are ever just beyond your grasp, and whose very articulations require severe work of thought. These submerged problems are those that condition us without our fully understanding why or how. They are depth problems...lodged deep inside of us all as the historical conditions of possibility of our present ways of doing, being, and thinking. Yet despite their depth, these problems are also right at the surface insofar as they condition us in our every action, our every quality, our every thought, and our every sadness and smile (Koopman, 2013, p. 1).

My impenetrable itch is backward design. I submit to and exercise it regularly, all the while feeling uncomfortable with it. It has colonized me, and when I exercise backward design, in France I now see this an (unwitting) attempt to colonize others pedagogically. I want to break away from this. But before I can do that, I need to understand its hold on me and on others. Backward design and I are only the tip of an iceberg. To understand how I have been conditioned, I decided I had to trace the historical development of what has now come to be the discourse of backward design.

To break away, I needed to understand not only the mechanisms that condition my educational thinking in the present day, but how these mechanisms have been created. The strength of these mechanisms is linked to their creation in history. These mechanisms continue to be reinforced in a multitude of ways; only by understanding these multiplicities of ways can I begin to break away from them. According to Foucault:

It seems to me that the current political task in a society like ours is to critique the workings of institutions which appear neutral and independent, to critique and attack them in such a way that the political violence which has obscurely exercised itself through them will be unmasked so we can fight against them. (Chomsky-Foucault Debate on Power vs Justice 1971)⁵

I believed that Foucault's Genealogy could help me break the hold of backward design and answer the fundamental question of my thesis: *How has backward design shaped my beliefs, attitudes, and practice?*

⁵ <https://www.youtube.com/watch?v=xpVQ3l5P0A4&t=515s>

To explore and answer that question, I created subquestions:

- How has backward design gained legitimacy as an approach to teaching and learning?
- Why has objectives-based instruction come to have such a dominant role in education, particularly in the United States?

Dissertation structure

Chapter two discusses my methodology: genealogy. It starts with a brief introduction to Michel Foucault, then attempts to reconcile the different “methodologies” and “phases” that are attributed to his work. I discuss the meaning and purpose of genealogy and highlight the difficulties that arise when using this method. I also explain how I have shaped my own genealogical approach and the different Foucauldian elements I used. I also explore the influence on my thinking of Colin Koopman’s interpretation of genealogy. This led me to focus particularly on the concepts of power/knowledge, emergence and problematization. In relation to emergence, I also develop upon the concepts of *savoir* and *connaissance*. I also discuss the role of authors in educational theory and ideas, the eras to which authors belong, and why I believe it is important to study particular works in relation to my genealogy. Finally, I look at resistance to see how we can move past the regimes of truth that may condition us.

Chapter three looks at the emergence of new educational thought and practices that developed during a period of reform that has been called the Progressive Era in education in the United States. I will do this through a focus on key figures in the humanist, child developmentalist, social meliorist, and social efficiency educational movements. The problematizations being addressed by these movements centered on how schools could address the needs of the child and the needs of society. Important in this is Foucault’s concept of *savoir*: I compare the *savoirs* that were forming around student engagement and student and teacher capabilities by these educational movements. This chapter also discusses the emergence of an administrative education system which became a power structure through which these *savoirs* were able to function.

Chapter four discusses Ralph W. Tyler and his work *Basic Principles of Curriculum Design*. It shows the historical context in which Tyler developed a methodological way to construct curriculum. I call attention to the enormity of Tyler’s legacy, and how this legacy and the educational agents that applied *Basic Principles of Curriculum Design* in their work, contributed to the formation of the objectives-based regime of truth.

Chapter five discusses Taba Hilda and her work *Curriculum Development Theory and Practice*. Her work is situated against the backdrop of Sputnik and the overtly social focus of life adjustments curriculum was severely criticized. Renewed efforts in education attempted to return to a curriculum that emphasized academics, and blamed ‘educationalist’ for the lowered standard in education. Taba attempts to mitigate her form of objectives-based learning by criticising the Thorndikean S-R learning theory and instead emphasizing culture and field theory in her interpretation of objectives-based learning. Her work contributes to the regime of truth of objectives-based learning through her seminal text, but also through the application of her curriculum in the Development Project in Social Studies for the Contra Costa Department of Education in California.

Chapter six situates the publication of *Understanding by Design* by Wiggins and McTighe at the apex of the standards and assessments movement in the United States. This chapter attempts to trace the development of the standards and assessments episteme starting with the publication of *A Nation at Risk* and the shift in educational discourse to “excellence.” Under the banner of excellence, federal and state initiatives and measures align with a form of objectives-based learning, that creates an episteme of outcomes, standards, assessments, and accountability. Locked into this episteme, *Understanding by Design*, become truncated to backwards design, and serves as a blueprint to operationalize standards in the classroom. Chapters three, four, five and six open with critical questions that will guide the reader through the contents of the chapters. I will then return to the questions to discuss them more fully in the conclusion.

Chapter seven concludes my genealogical journey. I reflect on this journey and the challenges it posed. I reflect on the findings of my genealogy and how that has worked towards my understanding of backward design. Finally, I address how backwards design shaped my beliefs, attitudes, and practice and wonder where resistance can be found.

Chapter 2: Methodology

Introduction to Foucault

Michel Foucault was a French philosopher who explored discourse, power, and knowledge to critique social institutions such as psychiatry, the penal and education systems, and medicine. Prior to Foucault's conceptualization, power was often thought of as being *zero-sum* (Dean, 2013). This view sees power as existing in finite amounts: when one person possesses power, by default, power is lost by someone else (Dean, 2012). However, according to Foucault, power

is never appropriated in the way that wealth or a commodity can be appropriated. Power functions. Power is exercised through networks, and individuals do not simply circulate in those networks; they are in a position to both submit to and exercise this power. They are never the inert or consenting targets of power; they are always its relays. In other words, power passes through individuals. It is not applied to them (Foucault, 2003, p.29).

Foucault therefore explicated a conception of power that is relational, multiplicative, and able to be exercised by everyone.

Foucault's oeuvre is often divided into three distinct phases: archaeology, genealogy, and ethics. *The Archaeology of Knowledge* was first published in 1969 and was Foucault's attempt to describe the methodology of archaeology. He used this method in *Madness and Civilization*, *The Order of Things*, and *Birth of a Clinic*. Foucault's work during the archaeological phase focused on discourse and attempted to uncover the systems and rules that govern discourse within a historical period: why certain things are thought of and spoken about in a particular way within a given field at a given moment in history (Krarup, 2021). Foucault's work during the genealogical phase enquired into contemporary practices and how these were shaped by ideas and institutions in the past.

His book *Discipline and Punish* published in 1977 represents a shift from archaeology to genealogy. According to Garland,

Archaeology wants to show structural order, structural differences and discontinuities that mark off the present from the past. Genealogy seeks instead to show "descent" and "emergence" and how the contingencies of these processes continue to shape the present (2013, p. 371).

Through his genealogical method, Foucault questions the validity of various contemporary institutions and practices by exposing the power knowledge/systems that underlie them and which developed throughout history. It is the result of these power/knowledge systems that sustain modern institutions and practices despite the inconsistencies, incoherence, and

contradictions that surround them. Finally, his ethics phase is demarcated by a shift of focus from systems to the subject. Foucault (1997) refers to this phase as writing genealogies of ethics, “[w]here the genealogy of the subject as a subject of ethical actions, or the genealogy of desire as an ethical problem” (Foucault, 1997, p. 266).

Reconciling Foucault’s “methodologies” and “phases”

Rather than seeing Foucault’s work as three distinctive phases with each phase containing its own specific concepts and methodologies, I believe that the foundation of all his work is genealogical in approach, relating to a method evolved over his career. Categorizing his scholarship into three different phases may clarify his evolution as a thinker, but I believe that this categorization is not necessary. Foucault’s work serves to problematize contemporary practices through a historical analysis that shows how these evolve over time, but the continued use of these practices throughout history leads us to believe in the validity of these practices in the present.

Colin Koopman, in *Genealogy as critique Foucault and the problems of modernity*, argues that archaeology and genealogy should not be seen as differing competing methods. According to Koopman (2013, p.33), archaeology for Foucault was the study of “depth knowledge (*savoir*) and depth power (*pouvoir*) that make possible the surface effects of knowledge (*connaissance*) and power (*puissance*).” The genealogical method should be seen as an extension of archaeology – a “genealogy-plus-archaeology.” According to Koopman (2013, p.31), it is the addition of *temporal multiplicity* (in terms of the continuities and discontinuities that occur in history) and *relations between multiple vectors of practice* (rather than a focus on one vector, for example power *or* knowledge) that allows for the expansion of archaeology to genealogy. Koopman writes that archaeology

was informed by a singular conception of temporal discontinuity and a singular focus on the domain of knowledge such that genealogy expanded the view so as to wrestle with multiple temporalities and multiple vectors of practice. (Koopman, 2013, p. 32)

Koopman stresses that this conceptual change should not be read as a change in critical intent. Throughout his career, Foucault strove to elucidate modern problematics by illuminating how that past has conditioned our modern selves. Instead, this shift should be seen as denoting greater clarity in what Foucault was attempting to achieve, and “the work of thought that would be required to achieve it” (Koopman, 2013, p. 32). Foucault admits

that the word power may not have been articulated as fully as it might have been in his earlier work, but it was in fact this concept that he was studying. He writes:

I'm struck by the difficulty I had in formulating it [power]. When I think back now, I ask myself what else it was that I was talking about in *Madness and Civilization* or *The Birth of the Clinic*, but power? Yet I am perfectly aware that I scarcely ever used the word and never had such a field of analyses at my disposal (Foucault, 2010, p. 57).

This admission of an inability to articulate leads me to agree with Koopman's assessment that the shift comes from greater clarity of intent, rather than change of purpose.

Further supporting the idea of genealogy-plus-archaeology, Foucault writes:

Archaeology is the method specific to the analysis of local discursivities, and genealogy is the tactic which, once it has described these local discursivities, brings into play the desubjugated knowledges that have been released from them (Foucault, 2003, pp.10-11).

Concerning Foucault's later work, where the shift of focus moves from an analysis of systems of power to the a focus on the subject, Foucault stated the objective of his work throughout the years was not to "analyze the phenomena of power" or "elaborate the foundations of such an analysis" (Foucault, 1982, p.777). Rather his objective was to "create a history of the different modes of objectification by which, in our culture, human beings are made subjects" Foucault, 1982, p.777). In keeping with Koopman's line of thought, I believe that the shift in Foucault's work does not come from a change in intent, rather a greater clarity of that intent through the remodeling of a genealogical-plus-archaeological methodology and his application of this methodology in various domains.

Establishing how all of Foucault's work can be classified under a genealogical methodology grants me the possibility to use all of the concepts and methods of analysis Foucault developed throughout his career, rather than limiting these forms of analysis to a specific phase or methodology. Foucault himself tended to regard theory as

a toolbox of more or less useful instruments, each conceptual tool designed as a means of working on specific problems and furthering certain inquiries, rather than as an intellectual end in itself or as a building-block for a grand theoretical edifice (Garland, 2014, p. 366).

The analytical concepts and methods he developed as part of his genealogical-plus-archaeological methodology can be interpreted as conceptual tools (see Garland, 2014). The

right tool to use is determined by the problem at hand. For me the right conceptual tool was genealogy, which brings me to the question: *what is genealogy?*

What is a genealogy?

“Genealogy” was, for Foucault, a method of writing critical history: a way of using historical materials to bring about a ‘revaluing of values’ in the present day. Genealogical analysis traces how contemporary practices and institutions emerged out of specific struggles, conflicts, alliances, and exercises of power, many of which are nowadays forgotten. It thereby enables the genealogist to suggest – not by means of normative argument but instead by presenting a series of troublesome associations and lineages – that institutions and practices we value and take for granted today are actually more problematic or more “dangerous” than they otherwise appear (Garland, 2014, p372).

A genealogical study is a historical analysis of a contemporary practice. Unlike a traditional history which attempts to create a linear path from the beginning of an idea, its improvement throughout time, and the validity of its usage today, a genealogical study pokes holes in this linear path by exposing the discontinuity of the discourses that formulated the contemporary practice in question. Moreover, a genealogy attempts to analyze how despite these discontinuities, this practice continues to exist. This analysis is achieved by tracing and unweaving how power/knowledge structures create “truths”.

Genealogy attempts to show how historicizing a contemporary practice gives the freedom to move away from the rigid use of that contemporary practice, back to the more malleable state that it was in the past before it achieved the status of a “truth”. Foucault wrote that he wanted to “reintegrate a lot of obvious facts of our practices in the historicity of some of these practices and thereby rob them of their evidentiary status, in order to give them back the mobility that they had and that they should always have” (2007, p.139). Foucault therefore described genealogy as “a matter of making things more fragile” through historical analysis (2007, p.138). Genealogy shows “both why and how things were able to establish themselves as such” while at the same time showing that these things “were established through a precise history” (Foucault, 2007, p.138).

However, the challenges of a genealogical study do not lie so much in why one might be carried out. As with other postmodern methodologies its aim is to criticize a normative stance. The complexity of a genealogical study is in the how.

Genealogy and its complexities

One main challenge in constructing a genealogical project is that there is no systematic method with which to approach this project. Even for Foucault, each genealogical inquiry

was different from any other. Tamboukou (1999) comments that a “deployment” of Foucault’s techniques

can never be exhaustive or finalized. Foucault's originality lies in his strategic use of different discourses and approaches in the writing of his genealogies [...] Rather than following methodological principles, Foucault's genealogies create a methodological rhythm of their own, weaving around a set of crucial questions [...] (Tamboukou, 1999, p. 217).

Depending on the question - or problem - that Foucault was attempting to answer, his modes of analysis changed. He wrote:

I do not have a methodology that I apply in the same way to different domains. On the contrary, I would say that I try to isolate a single field of objects, a domain of objects, by using the instruments I can find or that I forge as I am actually doing my research, but without privileging the problem of methodology in any way (Foucault, 2003, p. 287).

Reading Foucault is an exercise in mental flexibility. Although he may at the onset describe what he will write about, it is rarely the case that he keeps his promise to his reader. If he does, the original promise will have been reworked and modified. Of his own work he stated: “If you knew when you began a book what you would say at the end, do you think that you would have the courage to write it?” (Foucault, 1988, p. 9).

Furthermore, as noted above, Foucault encourages the use of his scholarship as a conceptual toolkit rather than an inflexible analytic approach. If even the most minute aspect of his work can be used as a way to challenge power structures, then his work is being used “correctly”:

All my books... are little toolboxes, if you will. If people are willing to open them and make use of such and such a sentence or idea, of one analysis or another, as they would a screwdriver or a wrench, in order to short circuit or disqualify systems of power, including even possible the ones my books come out of, well, all the better (Foucault, 1996, p. 149).

However, it was a challenging task to read Foucault and attempt to outline his genealogical method. I attempted to do this by reading *Discipline and Punish, Society Must be Defended*, and *The Birth of Biopolitics*. In all three cases, it was challenging to separate out the subject matter that he was discussing (he never uses citations) from his *analysis* of this subject matter, and his analysis from his *method*. Given that Foucault’s writing can be opaque, I turned to other researchers who published articles and doctoral dissertations and attempted to analyze how they used genealogy in their research. Through this process I separated their

styles into three types: those that combined the genealogical approach with other theories/methodologies (Savas, 2007; Das, 2018; Farrell, 2019), those that use a blanket definition of genealogy as a means of analysing the past through power/knowledge relations to understand the present. Those that used this blanket definition only describe power/relations as their analytical tool, and did not describe other Foucauldian tools of analysis (Labaree, 1922; Bell, 2011; Simpson et. al 2014). And finally, those that specified which Foucauldian tools of analysis they would use for their research analysis (Hoskin, 1986; Prasad, 2009; Newland, 2012; Cruz, 2018).

Some authors complimented the genealogical approach with other theories such as Fairclough's model of discourse analysis (Savas, 2007), Townley's power-based theory (Das, 2018), and autoethnography (Farrell, 2019). Others use the genealogical approach to reframe how we see the present by unearthing power/knowledge relations that has been buried with the passing of time. Sheri Bell (2011) traces how the government and child welfare movements shaped and impacted the discourse around "child abuse." Simpson et al (2014) trace the discourse of compassion and problematize its usage in organization theory. David Labaree (1992) uses the genealogical approach in his analysis of teacher professionalization historicizing the attempt of teacher educators to raise their status and develop a science of teaching. Others acknowledge the multitude of ways that a genealogical project can be shaped and outline the specific Foucauldian analytic devices they will use in their research (Hoskin, 1986; Prasad, 2009; Newland, 2012; Cruz, 2018).

Another challenge in using a genealogy is its highly subjective nature. When asked why his works have a strong emotional undertone Foucault simply stated: "Each of my works is a part of my own biography. For one or another reason I had the occasion to feel and live those things" (Foucault, 1988, p.11) That initial itch, or problem, that is attached to a genealogy is personal by nature. If one did not feel that itch, then it would not present itself as a problem to begin with. This implies that the Foucauldian tools you use to address these problems are subjective as well. Finally, awareness of your own abilities, capacities, and time frame for research puts an external limitation on the genealogical process. In his *History of Sexuality* (1990, p.93), Foucault claims that "[p]ower is everywhere": tracing power through genealogy could be an endless project. A genealogist then must create boundaries; limitations need to be set on how far back in time one will go and the fields of power that will be explored.

Although the difficulty of using a genealogical method is discussed, this discussion rarely expands on how the methodology is developed and applied. Authors that encourage the use of a genealogy warn of its complexities and ambiguous nature. For example, Jorgenson (2002, p. 38) states that a genealogy is a "very time-consuming as well as being

mentally laborious, since from time to time the genealogist feels that he's not getting anywhere." Fortunately for me, two doctoral students were brave enough to acknowledge the difficulties in their research. One doctoral student wrote:

As the documents continued to pile on my desks at work and home, I began to ponder how one would even begin to do a genealogy...Foucauldian analysis provided freedom to engage with the documents and make use of Foucault's 'little toolboxes,' but I found that freedom to be daunting as well (Newland, 2012, pp. 39-40).

Another doctoral student reflected as follows:

I struggled with the non-conventional route that my study would take. On EdD weekends, colleagues would ask, 'Have you finished your literature review?', 'Have you got your ethical approval?', 'When are you collecting data?', 'How are you presenting your data?' I failed to answer any of these questions and while my colleagues were progressing chronologically through their research projects, I felt lost in a sea of old history books and Foucault. I found this process difficult, as I felt my progress was slow as I trawled my way through the literature (Farrell, 2019, pp. 15-16).

The challenges that come with using a genealogical approach creates insecurity in the researcher. We can look to other genealogists for inspiration, but we can never obtain a complete validation if what we are doing is correct. As Tamboukou states, "there is no way of truly understanding what genealogy is about, other than by concentrating on genealogy" (1999, p.211).

Shaping my genealogy

Having felt the insecurity of multiple ideologies conflicting within me in terms of my knowledge and understanding of education, I knew that Foucault's philosophy and methodology would help me in unpacking my professional identity. I chose backward design as my subject whilst I was an instructional designer in a newly developed pedagogical innovation lab in a business school that wanted to improve the teaching quality of its faculty members. As I was benchmarking Teaching and Learning Centers, I noticed that many of these centers were referring to backward design. I found this intriguing because on the one hand, it gave me a sense of security that I had something to say when faced with a professor regarding how to design a course; on the other hand, it fed into my insecurity of helping a professor design a course, because I had used the concept of backward design to ultimately "teach to the test" as a teacher in New York City. I felt that it was a reductive form of teaching

and course design, but at the same time it was a simple method to explain to professors how to incorporate learning objectives in their course design. When, I decided to base my research topic on backward design, I began to read journal articles that discussed backward design, as well as policy documents and journal articles related to outcomes-based learning, standards, and curriculum development.

As I was reading, I made genealogical maps of the ideas and concepts that I highlighted from the literature. The more I read, the more complex the genealogical maps became, and I knew there was a need to narrow my focus. Although outcomes-based learning and backward design appeared in different disciplines outside of education such as language, medicine, and management, a major fork in my discourse analysis came when I had to choose to focus on discourse from management theory or education. I was working in a business school and thought that untangling the relationship between management theory and outcomes-based learning, standards, curriculum design could be particularly relevant to me and my work in a business school. That was my first option. Or, as a second option, I could consider tracing curriculum development and outcomes-based learning in American education. In the end, my vanity got the best of me, as what I really wanted to understand was who I am as an educator, and why I think and do the things I do. And I could only do this by understanding the educational system that formed me as a teacher. I chose the second option.

My scope narrowed further when I became more interested in the authors that were often used in conjunction with Wiggins and McTighe and backward design. It was unsurprising to see Ralph W. Tyler associated with backward design, but I also read about an author who was unfamiliar to me, Hilda Taba. Taba was often linked by authors to Tyler and backward design (Cho, 2005; Kelting-Gibson, 2005; Hockett, 2009, Richards, 2013; Dack, 2019, Trwosdale, 2023). By the end of my genealogy, I could see that Tyler and Taba have a strong genealogical link to Wiggins and McTighe for several reasons. Firstly, their interest in curriculum design led to their development of a procedural process for curriculum design. Secondly, governmental influence on their works, either through state or federal reforms, shaped their thinking and practice. Thirdly, the strength of the performative aspect in terms of learning that is evident in their thinking. Interestingly, Taba and Wiggins and McTighe differ from Tyler in two ways: (1) their strong interest in demystifying what understanding is for a learner, and (2) belief in empowerment through education. I believe this divergence comes from the influence of John Dewey as I will explain in due course.

The identification of these three main figures in backward design helped me to set the limitation of time in my genealogy. I decide to focus the timeline of my genealogies on the eras when these figures published their most influential works: the Progressive Era

(Dewey), Post WWII (Tyler), the 1960s (Taba), and the 1990s (Wiggins and McTighe). These four eras provide the context for the development of the authors' ideas. I delved deeper into the different policy and institutional documents such as those written by universities or commissioned by private enterprises like the Rockefeller Foundation. I also looked at various educational articles published in each era to gain a stronger understanding of the different educational discourses that were growing and developing and the counter-discourses that were regressing and receding. I also followed the development of higher education institutions, particularly the development of colleges of education and education departments within these institutions. These institutions had a major role in the power/knowledge system, both in the creation of knowledge and their role in the development of the administration system in public education, especially in large cities.

As I was working through the documents from the different eras, I began to fall into endless rabbit holes. There is so much ground to cover when using the genealogical method, and this gruelling work must be done for the genealogist to find the cracks in the hegemony of history. Moreover, the more I read and began to see the long lineage of power structures that have shaped approaches to outcomes-based learning today, the more impossible it seemed to ever move away from this method of teaching and learning. At one point, I felt that the only way to resist this movement was through inaction, and it led me to feel a sense of nihilism, a critique that has been associated with Foucault (Bannister, 2010; Vogelmann, 2017). To help me move past the impossibility of it all, I turned to an author who would become very influential in my understanding of genealogy: Colin Koopman.

Re-reading *Genealogy as critique: Foucault and the problems of modernity* helped me remember what I needed to focus on whilst reading through the past:

The genealogical practice of critical inquiry [...] is one that emphasizes a study of the relations between power and knowledge as well as a study of temporal processes of emergence. These two aspects of inquiry can be brought together in terms of the clarification and intensification of problematizations. These three Foucaultian elements of power-knowledge, temporal emergence, and problematization constitute the core of his reconstruction of critique. Critique now becomes an inquiry into the conditions set by problematizations as they manifest in the contingent emergence of complex intersections of practices (Koopman, 2013, p. 48).

The three Foucauldian elements that Koopman identifies will be explored more fully in the next section, but for now it is sufficient to say that reading this helped me to reframe my reading of the historical documents. It helped me to remember how a genealogist reads history, versus how a historian reads history. Genealogists narrate history through the problems that practices claim to solve. As Koopman says, this means that “the genealogist

will seek to narrate and explain historical processes by reference to the problems that motivate certain processes and the specific practices that develop in response to these problems” (2013, 97). This refocusing helped me realize that I had enough material to start constructing my genealogy.

Koopman also allowed me to see past the inevitability of it all by helping me to understand what freedom means if we accept Foucauldian theory. If Foucault created a new conception of power, then he also created a new conception of freedom. Koopman (2013, p.174) describes this as *transformative freedom*:

Freedom, we may find, is most transformative when it is humble and hesitant, exploratory and experimental. Freedom, perhaps, is not always as obvious as we would have wanted. Experimental freedom perhaps does not make for good cinema on the blockbuster model. But it does make, and may make further, for good practices of freedom.

Koopman helped me to realize that if we view power as non-totalizing and disciplinary, then we should shift how we view freedom. With this shift in focus, I came to understand that there is no such concept as complete liberation from something, just as there is no such concept as complete power. Freedom comes through making choices, and being aware of what chains of power are being activated in this choice, seeing how that choice plays out, and knowing that if you are unsatisfied with how it has played out, there are other chains of power to activate. There are other choices to be made and nothing is cemented. Writing this genealogy will help me find some of these choices and possibilities, because it will help me understand how the complex problem in curriculum in education was able to be reduced to a simple solution through backward design. It will enlighten me to the other ways that curriculum development was thought of, allowing me - and other practitioners - to regain mobility of thought about curriculum development.

Koopman also helped me change my perspective in what my genealogy will do. Doctoral dissertations often become conclusions. I felt a sense of pressure that an answer had to be found after I completed my genealogy, and as I was working, I kept wanting to find *the* solution to the challenge of curriculum design. But genealogies do not do that. Koopman writes that genealogies are made

to critically show the way in which certain practices, beliefs, and conceptions have become problematic in the history of thought due to the contingent intersection of a complex set of enabling and disabling conditions. To say that practices are problematic is not to insist that they are wrong. It is to insist that they constitute a field in which we find that we must continue to work. Foucault is saying, for example that we must concern ourselves with the problematic relations between modern power and modern freedom – for

example, between the powers that we at times unthinkingly use to regulate sexual practices and the freedoms we attribute to certain supposedly liberating sexual practices. Genealogy taken in this sense is an initiating, rather than a concluding phase of thought. (2013, p. 95)

The purpose of genealogy is not to find a solution or to fix a problem, rather it is to initiate phases of thought about the issues we are exploring. Seeing genealogy as an opening to possibilities rather than concluding an analysis gave me air to breathe. Finding a solution to a problematic modern practice that has evolved and been maintained through a complex system of power/knowledge in a doctoral dissertation seems ridiculous to me now in retrospect. But what my genealogy can help me to do is to think beyond thinking in terms of a singular or dominant way to construct curriculum. It could give me – and others - the courage to try something new that could be worse, just as good, or better, because we know that we can also change and adapt our choices when we are freed from constraints. Through Koopman, I was able to move forward in my research because I realized it is fine to be humbled by the past, and it is okay to have a humble and hesitant path forward.

Equipped with a refined perspective on my purpose, I went into my genealogical toolbox and started thinking about which tools could I use to begin uncovering the system of power that had contributed to the creation of backward design.

Power / Knowledge

According to Foucault, power and knowledge are inextricably linked. Power is part of every aspect of society. Power is not held by individuals or entities, rather it is activated by individuals and every individual has the possibility to do this. However, Foucault believes that power cannot exist without knowledge. Power cannot exist without the validation of a form of “truth.” Relations of power

are indissociable from a discourse of truth, and they can neither be established nor function unless a true discourse is produced, accumulated, put into circulation, and set to work. Power cannot be exercised unless a certain economy of discourses of truth functions in [...] that power. (Foucault, 2003, p. 24)

At the same time, knowledge is contingent to power. For Foucault, knowledge is not value-free. Knowledge is not an ideal “truth” that we should strive to know or understand. Rather, knowledge is produced and shaped by power relations. In *Discipline and Punish* he writes,

We should admit [...] that power produces knowledge (and not simply by encouraging it because it serves power or by applying it because it is useful);

that power and knowledge directly imply one another; that there is no power relation without the correlative constitution of a field of knowledge, nor any knowledge that does not presuppose and constitute at the same time power relations. These 'power-knowledge relations' are to be analysed, therefore, not on the basis of a subject of knowledge who is or is not free in relation to the power system, but, on the contrary, the subject who knows, the objects to be known and the modalities of knowledge must be regarded as so many effects of these fundamental implications of power-knowledge and their historical transformations (Foucault, 1995, p. 27).

As power-knowledge relations strengthen through production, circulation and legitimization, “regimes of truth” are created. Foucault states:

‘Truth’ is to be understood as a system of ordered procedures for the production, regulation, distribution, circulation and operation of statements. ‘Truth’ is linked in a circular relation with systems of power which produce and sustain it, and to effects of power which it induces and which extend it (Foucault, 1980, p. 133).

Regimes of truth form an apparatus or *dispositif* shaped by various factors such as government and politics, social and educational institutions, and cultural values. Each society has their own regimes of truth. These filter for a society what things that can be constituted as true, and the practices and behaviors that go along with these ideas of truth. Regimes of truth are not static: they are shaped and molded by the different historical contexts that maintain them throughout time. In his various works, Foucault shows us ways in which we can surmount this apparatus through different types of power analyses.

Emergence

Foucauldian genealogies do not search for origins, rather they try to understand emergence. Looking for the origins of a thought implies that what we think of as truth today came from a linear succession of ideas that was improved upon as time went on. Emergence, on the other hand, is an approach that looks at how particular thoughts and behaviors became meaningful in a society. Emergence questions what the conditions in society at that time were that led people to come to accept these ideas and ways of doing. Foucault writes: “The emergence of an object is not a given, nor is it a privilege; it depends on the play of complex rules, constraints, and processes of exclusion that operate within the discursive field” (Foucault, 2010, p. 198).

Foucault differentiates between two types of knowledge: *savoir* and *connaissance*. *Savoir* is the practical and lived knowledge that is obtained through experience: "What characterizes *savoir* is that it is a knowledge that is limited to a particular domain and is

linked to a certain period and a certain society" (Foucault, 1970, p. 193). *Connaissance* on the other hand is knowledge that is generalizable. It is a knowledge that is verified through science: "*Connaissance* is knowledge that is not limited to any particular domain or subject matter, but is instead a general knowledge that applies to all domains and subject matters" (Foucault, 1970, p. 193).

Savoir and *connaissance* should not be viewed as forms of knowledge that are oppositional. Foucault wrote: "It is not a question of opposition between *savoir* and *connaissance*, but of two poles of a continuum, which are constantly shifting and modifying each other" (Foucault, 1970, p. 193). Depending on the *dispositif* that is forming at a particular time, a *savoir* can form into a *connaissance*, and a *connaissance* can recede back into a *savoir*. The formation of the *savoir* into a *connaissance* is the *emergence*. Emergence will have a key role in Chapter 3: The Progressive Era as this chapter will outline the societal problems at that time, and the various institutions and administrations that were created to address the various problems. It will also discuss the important people of the time who were foundational in the formation of pedagogical thoughts and practices that took shape in the Progressive era and which continued to be developed over time in American education. In this chapter we will see how pedagogical ideas and practices that once had a privileged status began to recede and alternative ideas and practices emerged.

Problematization

Having discussed, Power/Knowledge and emergence, I will now turn to the final element necessary in a genealogical critique according to Colin Koopman: problematization (2013). Koopman's interpretation of problematization is two-fold: a nominal object of inquiry (a problematization) and an act of critical inquiry (to problematize). Problematization expressed as a noun can refer to (1) "ways in which emergent practices render problematic certain other conceptions that are no longer capable of effectively performing the work they once achieved" or (2) "the ways in which the deficient status of these older practices themselves pose a problem to be solved or a question to be answered" (Koopman, 2013, p. 100). In other words, the nominal form of problematization is the identification of the initial reasons why certain knowledges become subjugated. For Foucault subjugated knowledge is both the "blocs of historical knowledge that were present" but hidden away in the formalization of a particular discipline, and also the disqualification of a whole set of knowledges as they are deemed to be "inadequate to their task or insufficiently elaborated: naïve knowledges located low down on the hierarchy, beneath the required level of cognition or scientificity" (Foucault, 1980, p. 82). The latter form of subjugation is what I believe

Koopman is referencing in his first interpretation of problematization. Problematization in its nominal sense is asking: “What was happening that these knowledges were rendered problematic, and therefore subjugated?”

The second dimension of problematization serves two purposes: to clarify and to intensify.

In one sense, problematization is simply a descriptive study whose aim is to clarify certain past problematizations that have enabled the development of present practices. But in another sense, problematization is a critical tool that can be used to intensify our concerns with those problematizations that continue to inform our present ways of constituting ourselves (Koopman, 2013, p. 100).

Problematization as a mode of inquiry aims to show the fragility of the *dispositif* created by the regime of truth. “[P]roblematization’ [is] an effort to render problematic and doubtful the evidences, practices, rules, institutions and habits that had been sedimented for decades and decades” (Foucault quoted in Koopman, 2013, p.98). To articulate this inquiry, I will use Foucault’s suggestions on how to analyze power.

One way to analyze power is through an ascending analysis. Since power for Foucault is not ‘zero-sum,’ the first place to look should not be in the traditional domains where power was once thought to be held, such as government institutions. The start of the analysis of power should come from a smaller manifestation of it:

...we should make an ascending analysis of power, or in other words begin with its infinitesimal mechanisms, which have their own history, their own trajectory, their own techniques and tactics, and then look at how these mechanisms of power, which have their solidity and, in a sense, their own technology, have been and are invested, colonized, used, inflected, transformed, displaced, extended, and so on by increasingly general mechanisms and forms of overall domination. (Foucault, 2003, p. 30)

This ‘infinitesimal mechanism’ is what the genealogist needs to begin unpacking. However, this small unit is the manifestation of power, and thus the complexity of its construction should not be undervalued. This unit is the intersection of various discourses, strategies and power relations and the activation of this unit is the multiplication of a specific chain or chains of power.

What then can this unit be? Koopman (2013, p.102) suggests that we focus on practices, which “can be understood as both complex constituents of a problematization and as themselves conditioned by complex assemblages”. Koopman states that the “precise point of focus of a genealogy” is therefore not behaviors, mentalities, meanings or structures “but practices and the problematizations they form in their multiplicity” (2013, p.102). Although

I agree with Koopman that practices are a unit in the power assemblage that could be used as a point of entry, in the next section I will propose a different point of entry. However, before moving on to describing my point of entry, I will end this section with a description of another way to analyze power and that is through governmentality.

During the 1970s, Foucault refined his analysis of power relations through the elaboration of the analytical tool of “governmental rationality” or “governmentality.” Foucault stated: “what I have proposed to call governmentality, that is to say, the way in which one conducts the conduct of men, is no more than a proposed analytical grid for these relations of power” (Foucault, 2010, p. 186). For Foucault, “conduct” denotes two meanings:

Conduct is the activity of conducting (*conduire*), of conduction (*la conduction*) if you like, but it is equally the way in which one conducts oneself (*se conduit*), lets oneself be conducted (*se laisse conduire*), is conducted (*est conduit*), and finally, in which one behaves (*se comporter*) as an effect of a form of conduct (*une conduite*) as the action of conducting or of conduction (*conduction*) (Foucault, 2007, p. 258).

In other words, power for Foucault is conducted not only in its exercise over individuals, but also *through* individuals. The “conduct of conduct” or “*conduire des conduits*” (Foucault, 2007, p. 237) is an analysis of power at the level of the individual. Power operates in individuals through certain rationales, tactics, strategies, and practices, which become internalized, shaping an individual’s thoughts, behaviors, and self-regulation, and, so, their social conduct.

It is worth quoting in detail a more elaborate definition of governmentality given by Foucault during his lectures at the *College de France*:

First, by “governmentality” I understand the ensemble formed by institutions, procedures, analyses and reflections, calculations, and tactics that allow the exercise of this very specific, albeit very complex, power that has the population as its target, political economy as its major form of knowledge, and apparatuses of security as its essential technical instrument. Second, by “governmentality” I understand the tendency, the line of force, that for a long time, and throughout the West, has constantly led towards the pre-eminence over all other types of power –sovereignty, discipline, and so on – of the type of power that we can call “government” and which has led to the development of a series of specific governmental apparatuses (*appareils*) on the one hand, [and, on the other] to the development of a series of knowledges (*savoirs*). Finally, by “governmentality” I think we should understand the process, or rather, the result of the process by which the state of justice of the Middle Ages became the administrative (Foucault, 2007, p. 144)

The rationales, tactics, strategies, and practices that shape and regulate the conduct of individuals, are formed by a complex interplay of institutions, discourses, and practices through which power operates. Analyses using “governmentality” or “the conduct of conduct” often focus on how education reform and policy conducts conduct in various educational settings (e.g. Tikly, 2003; Gillies, 2008; Farrell, Duckworth, Reece & Rigby, 2017; Perryman, Ball, Braun, & Macguire, 2017; Courtois, 2020; Hautz, 2022). Examples of studies that break from this trend use advertisements (Pereira, 2019) or cinema (Rekabtalaei, 2018). For my study, I analyze the works of key thinkers at particular periods in the history of education using governmentality to illustrate how their works contribute to the regime of truth of objectives-based learning that conducts the conduct of teachers and education professionals.

The role of the author / academic

As I was reading through the historical documents of the various eras I was investigating, the works of the authors I had previously mentioned (Tyler, Taba, and Wiggins and McTighe) became more interesting as, through the genealogical process, I came to see their works within the greater complexity of the power assemblage. Regarding the role of the author, Foucault emphasizes that we should adjust the perspective in which we see authors. Rather than seeing them as unique, creative individuals, we should understand them as a part of the power *dispositif*:

[...] the author is not an indefinite source of significations that fill a work; the author does not precede the works; he is a certain functional principle by which, in our culture, one limits; excludes; and chooses; in short, by which one impedes the free circulation, the free manipulation, the free composition, decomposition, and recomposition of fiction (Foucault, 1998, p. 221)

The position that these authors (Tyler, Taba, and Wiggins and McTighe) hold in the power *dispositif* make their work particularly valuable to analyze because they are at the intersection of so many different chains of power. They are working within a social science (education) that emerged as a field during the Progressive Era and continued and continues to grow and develop and obtain its legitimacy in various ways. Through their works, we can see how power is functioning within them and how they are activating power. For me, their works are the ‘infinitesimal mechanism’ in the power *dispositif*:

When practices intersect (collide with, borrow from, build on top of, or merge into on another), they tend to produce tensions in a way that is often productive insofar as these tensions give rise to problematization that operate as both obstacles to certain older forms of practice and bases for the elaboration of newer forms of practice. (Koopman, 2013, p. 105).

As these authors are at the intersection of the different pathways of power, their works are filled with tensions, and we see their attempts at negotiating their ways out of these obstacles.

They are the best place to analyze subjectification. Foucault writes on subjectification:

This form of power [a technique] applies itself to immediate everyday life which categorizes the individual, marks him by his own individuality, attaches him to his own identity, imposes a law of truth on him which he must recognize, and which others have to recognize in him. It is a form of power which makes individuals subjects. There are two meanings of the word "subject": subject to someone else by control and dependence and tied to his own identity by a conscience or self-knowledge. Both meanings suggest a form of power which subjugates and makes subject to... (Foucault, 1982, p. 781).

For Foucault, subjectification is two-fold. In the first instance, it is when power is exercised by someone onto someone else. For instance, when a teacher's work is evaluated on a specific criterion there is an imposition of how a teacher is expected to teach. There is an element of control or power over someone in this form of subjectification. I believe the works of the authors I analyse were formative in shaping not only the criteria of what should be taught but also the practice of teaching, or how things should be taught. The contribution of these authors in American pedagogical discourse subjects teachers today to a specific method of understanding and practicing teaching.

The second form of subjectification questions the identity of a person. How has a person come to be who they are? What are the invisible influences that shape a person's understanding of the world and their thinking about the world? Reading the works of Tyler, Taba, and Wiggins and McTighe through the lens of subjectification is interesting because I can observe their unconscious attempts at negotiating, combining, extracting, and ignoring conflicting ideas in education as they try to rationalize their points of view. Reflecting on their work allows me to understand how their rationalization comes together and how combining contradictory ideas works to legitimize their thoughts and practices in education rather than rendering it false. It is through this examination that we see how their weaving together of elements from different theories, which at times seems almost piecemeal, creates new wholes. Furthermore, analyzing the works of the authors and their attempts to weave together conflicting ideas allows teachers to better understand why they may have conflicting ideas and values in their identity as an educator.

This leads me to another reason for studying the works of these authors. Their works are the place where we can find resistance. The works of these authors are often seen through the narrow perspective of the practices that have survived into the modern day. However, these authors were part of a complex system, and their works were also complex. Through their works we can see not only the knowledges that were being subjugated during their time, but we can also see the knowledges they were attempting to activate that have subsequently become subjugated through time. Finding both forms of subjugated knowledge opens a path to resistance.

Resistance

The possibility of a different *way of doing* is opened by a genealogy. Understanding how the past has formed the practices of the present, allows us to understand ourselves, our possibilities of resistance and create different ways of doing. Koopman writes:

Getting clear on the distinction between the fact that our practices are contingent and the history of how these same practices were contingently composed goes a long way toward recognizing the broader import of genealogy. For if genealogy helps us see how our present was made, it also thereby equips us with some of the tools we would need for beginning the labor of remaking our future differently [...] To make those constructions different, to make ourselves otherwise, we need to know, amongst other things, how it was that we made ourselves into who we are. (Koopman, 2013, p. 130).

Because of the subjective nature of genealogy, my preference for certain subjugated knowledges may be over-emphasized in my genealogy. However, I do not believe that this is a fault in the application of this methodology. Rather, it is a part of the methodology. It is an acknowledgement that I am part of the *dispositif* of the science of education and the freedom to exercise power within this *dispositif*. Foucault wrote that power

is exercised only over free subjects, and only insofar as they are free. By this we mean individual or collective subjects who are faced with a field of possibilities in which several ways of behaving, several reactions and diverse compartments may be realized. (Foucault, 1982, p. 790)

Analyzing the works of authors, is also an analysis of the self. Through the analysis of their work, we see the multiple discourses that were shaping them, and shaped teachers and educators (including myself). Realizing that their pedagogical rationale is woven from different and not always consonant theories allows me to understand why my identity as a teacher is also fragmented. Analyzing how they have paired and combined certain discourses

with others and what the activation of that chain of power implies, gives the potential to ask, what happens if we stop activating that chain of power and activate other ones?

Beginning the genealogical journey

Having explained my genealogical approach, my genealogical journey will now begin. It would be prudent to note that a genealogy is not a critical analysis as such, rather it is a tracing of ideas to reveal the episteme that form ideas and the subsequent practices that come from these ideas. With that purpose in mind, this genealogy will rely on primary and secondary sources to trace the educational ideas and social/political context from which backward design emerged. This tracing starts with the Progressive Era.

Chapter Three: Progressivism

Introduction

This chapter will deal with emergence of power/knowledge in relation to the educational ideologies and movements that began to form in the Progressive Era. The Progressive Era began in the 1890s through to the 1920s and represents a period of social and political reform in response to the growing issues of industrialisation and child labour (Perera, 2014). This chapter begins the process of untangling the contemporary educational power/knowledge discourse around objectives-based learning and backward design. Koopman (2013) uses an hourglass metaphor to describe this process of untangling. He suggests thinking of an hourglass on its side, but rather than sand, on one side we have different colored threads tangled together. These tangled threads represent how we experience the ideas of the past in the present – as a singularity, blended as one. However, when we attempt to untangle these ideas, and pull on a thread and try to bring it to the other side of the hourglass, we can only pull on it so much before it makes the tangled threads tighter. In chapters 4, 5, 6 we will see how the conceptions of curriculum design developed by Tyler, Taba, and Wiggins and McTighe can be thought of as tangled threads. I believe that showing how, during the Progressive Era, these threads became tangled allows us to better understand the evolution of educational thoughts and practices as they developed through time.

This chapter will first outline four educational movements through the lens of key figures within these movements. Three of these movements were progressive and positioned themselves against the fourth movement situating it as traditional. Within these movements, I will focus the discussion around two key ideas that emerged: student engagement and capabilities. The need to address student engagement and the capabilities of students and teachers were problematizations that emerged during the Progressive Era because education was being tasked to meet both the needs of the child and the needs of society. As the educational movements moved to address these societal problems, *savoirs* began to develop.

This chapter will also discuss a new governance in American education – administrative education - which also emerged in this era. Administrative education not only marked the beginning of a shift in power in education from small local communities to cities, states, and universities (Steffes, 2012), it also became a new power structure where emerging knowledges gained acceptance and legitimacy. Within this new power structure, new educational roles were created allowing for other people apart from teachers to exercise power in the school structure. The discussion will conclude with the knowledges and practices subjugated by administrative education.

The critical questions that guided my study of the Progressive Era were as follows: *What were some of the major educational movements that emerged during the Progressive Era that continue to shape contemporary educational practices in America today? What were the existing discourses that shaped the ideas and practices of these emerging movements? How did these movements frame the conduct of students and teachers? How did the developing knowledge (savoirs) from these movements engage with the rising development of administration in education?*

Educational Movements in the Progressive Era

In this chapter, I trace the educational movements in the Progressive Era through which the *savoirs* of engagement and capabilities emerged. However, the transforming ideas on education during this era can be difficult to trace and untangle. Different historians have tried to classify these ideas in various ways, according to Labaree:

David Tyack talks about administrative and pedagogical progressives; Robert Church and Michael Sedlack use the terms conservative and liberal progressives; Kliebard defines three groupings, which he calls social efficiency, child development, and social reconstruction [or social meliorist]. (Labaree, 2005, p. 279).

Any categorization should serve as an organizational guide rather than a definitive demarcation of where ideas stop and begin. I chose to use Kliebard's (2004) categorization of these movements: humanist (or mental disciplinarian), child development, social meliorist, and social efficiency. I will discuss them in that order. I will analyze these movements through the lens of important educational figures that shaped the ideas within these movements. For the humanists, I will focus on Charles William Eliot. For the movements classified as progressive (child development, social meliorist, and social efficiency) I will focus on the ideas of G. Stanley Hall, John Dewey, and Edward Thorndike respectively. I will discuss how their initial ideas led to the emergence of differing *savoirs* around educational theory and show how they attempted to resolve the same problem: improving education so it meets the needs of the child and society.

Historical context

These ideas grew from a particular historical period. At the turn of the 20th century, America was amid its second industrial revolution and undergoing a period of rapid change and

transformation. According to Urban and Wagoner (1996), the last decade of the 19th century and the first two decades of the 20th century is referred to as the progressive era. During this time, new technological advancements were being made such as the expansion of the railway system and new developments in factories. Technological advancements helped to boost the growth of industries and factories, which led to the development of urbanization (Shackel & Palus, 2006). Industrialization and urbanization changed the way of life for many Americans, creating social, cultural, and political issues (Steffes, 2012). For example, migration from rural to urban areas led to the breaking down of family structures (Rothbard, 1986). The second wave of immigration saw peoples coming from southern and eastern Europe which led to the problem of having a heterogenous population with respect to cultures, religions, and ideology (Urban & Jennings Jr, 1996). There was also a strong perception of injustice among industrial workers. This was the period when workers were beginning to organize and form unions to oppose the stronghold that robber barons had on the industries. Examples of such conflicts were the Homestead strike of 1882, the Pullman strike of 1894, and the Pennsylvania coal miners' strike of 1905. Adding to the consciousness of injustice was the ripening of muckraking -investigative journalism that exposed issues such as political corruption, child labor, lack of sanitation and safety in urban dwellings, schools, and work environments, and business monopolies (Huysen, 2014).

This period also saw significant developments in American education. Prior to the Progressive Era, the American education system was fragmented and underfunded (Steffes, 2012). The one-room schoolhouse was a rural staple in the education system. These schools were often community funded, and subjects taught were decided by the community (Mydland, 2011). Generally, if a student completed their education, it would be at the end elementary school, or what is now known as middle school (Steffes, 2012). Only the upper middle class and elites went on to college. However, the common school movement of the mid 1800s paved the way for a more universal education and by the late nineteenth and early twentieth centuries, there was a broad social movement for universal public education (Ravitch, 2000). The general aim of the common school in the mid 19th century, was to give students the “knowledge and critical-thinking skills necessary for effective citizenship” (Neem, 2020). To reach this goal, the curriculum focused on the three R’s (Reading, wRiting, and aRithmetic) as well as moral virtue. The teaching of moral virtue was perhaps the most contentious part of the common school program, particularly at the onset, as it was based on Protestant values and was mistrusted by people of other faiths (Ritter, 2020).

At the turn of the 20th century, with the transformation to an increasingly heterogeneous society and more acute awareness of the societal problems that this heterogeneity imparts, there was a strong push for the expansion of a public education system

(Urban & Jennings Jr, 1996). According to Steffes (2012), states began to gain more influence in education over the local community and, as they did so, education for literacy and basic community needs in rural towns and city districts no longer seemed sufficient to meet the needs of society. During this time reformers believed that there was a greater social, economic, ideological, and political purpose for schools (Steffes, 2012). A belief grew that educating youth through public education would solve societal woes: as this belief became more accepted the perceived problem of educational reform was elevated to a national level as something that needed a solution (Brass, 2016). According to Brass (2016), the term for this phenomenon is the *educationalization of social problems*. This term “indicates the exemption of educational actions in a number of countries, particularly in the nineteenth and twentieth centuries, when mass popular education was increasingly conceived as a solution to perceived social, moral, economic, and political problems” (Brass, 2016, p. 222). As the US government and states realigned education as a solution to social problems, so existing educational theories and practices also became aligned. However, the realignment created openings for the development of new theories and practice designed to provide solutions to social issues.

Historicizing the ideas that shaped contemporary practice

Although each educational movement that emerged during the Progressive Era has distinctions from the other, I will also highlight some of the similarities to historicize these ideas. Underlining the similarities allows us to see where the limitations are in “innovative” ideas because they are bounded within the perceived problems of the time. It raises our awareness that the solutions proposed are of that era and for that era. Foucault writes:

the problem is not therefore to ask oneself how and why it was able to emerge and become embodied at this point in time; it is, from beginning to end, historical - a fragment of history, a unity and discontinuity in history itself, posing the problem of its own limits, its divisions, its transformations, the specific modes of its temporality rather than its sudden irruption in the midst of the complicities of time. (Foucault, 2010)

Pointing out the similarities also helps to problematize how the same idea in different movements gained different amounts of traction and acceptance. Problematizing this opens the space to analyze how the ideas in these movements moved through the power networks at this time. I will first place each movement briefly in the context of its key thinkers before moving on to discuss the ways in which the ideas associated with each movement came to be considered as a specific field of knowledge – a *connaissance*.

The Humanist movement

Kliebard (2004) claims that humanist philosophy in education in the United States was the dominant theory in education at the start of the Progressive Era. Those within this camp were referred to as mental disciplinarians (Stanic, 1986). This philosophy of education can trace its influence to “Cartesian and Aristotelian conceptions of the mind” whereby - like the body - the mind is exercised and through this exercise of the mind reasoning can be developed (Stanic, 1986). According to Kliebard (2004), humanist ideology in education centers around the belief that each person, through learning traditional subject matter and teaching methods that focused on exercising mental discipline, could develop reasoning, build a moral character, and develop sensitivity to beauty. Championed by elite high schools and universities in America, the apex of humanist education in America may have come with the publication of the *Report of the Committee of Ten on Secondary School Studies* in 1894.

At the time, this report was said to be:

the best working theory thus far proposed for the organization and conduct of our secondary schools, public and private Without some working hypothesis or theory no scientific work can ever be done, and as our evolution friends used to say, 'Many of the greatest contributions to human knowledge have been made by the use of theories either themselves imperfect or demonstrably false' (Mackenzie, 1894, pp. 147-148).

Commissioned by the National Education Association in 1892, the Committee of Ten (more formally known as the *National Education Association of the United States Committee on Secondary School Studies*) was tasked with harmonizing the piecemeal high school curriculum across the United States (Urban & Wragoner, 2013). The committee was made up of elite university and preparatory school presidents, principals, and headmaster with the Chairman of the Committee being Charles William Eliot (Kliebard, 2004).

The curriculum proposed by the Committee of Ten exemplifies humanist ideology in education. Although the curriculum was developed by the intellectual elite, for Eliot, “the purpose of secondary education was the same, or common, for all students; it was to discipline their minds in preparation for whatever activity was to follow” and should not be differentiated based on intellectual ability, social class, or future vocation (Urban & Wagoner, 2013, p. 185). The proposed curriculum allowed for some choice in subject matter based on student preference, though it still demanded students study traditional subjects such as Latin and Greek, history, geography, physics, chemistry, algebra, and trigonometry. A justification for this rigorous curriculum was that these subjects would develop a student’s mental discipline (Charles, 1904).

For mental disciplinarians, learning was achieved through the study of specific subjects. Each subject had an inherent logic built into them, and studying that subject would build a student's mental process or faculty and help them to build the skills to reason and develop critical thinking. Paul Monroe, who was a professor at Teacher's College in Columbia University, wrote in *A Text-book in the History of Education*:

The mind as a bundle of faculties was to be developed by exercising these various powers upon appropriate tasks whose value consisted in the difficulties they offered. These faculties were considered to have a necessary connection with one another, hence these disciplines were separate and distinct things; though some faculties were higher than others. The highest was the reasoning power to be developed by appropriate discipline in mathematics, logical disputations, and the languages; but the faculty upon which all the others depended, and upon the successful development of which depended the success of education, was the memory (Monroe quoted in Heck, 1909, pp. 15-16).

For mental disciplinarians, developing reasoning and critical thinking was necessary for every individual regardless of their lot in life (Stanic, 1986). What is also important to stress in their understanding of learning was the belief in the transfer of knowledge that could be achieved through the study of these classical disciplines. Studying mathematics, logical disputation and languages was believed to develop overall ability to reason that could be applied in other areas. It was this reasoning that was challenged by the emerging science in psychology, and rendered faculty psychology⁶ unscientific.

The Child Developmentalist movement

During the progressive era, interest in the welfare of children increased due to growing consciousness of the working conditions of children. Labor laws were passed to protect children and by 1899, forty-four states had passed labor laws (Perera, 2014). As children began to move away from work and into the classrooms, interest in how to retain children in schooling grew (Kliebard, 2004; Smuts 2006; Tyack, 2010; Steffes, 2012). Because of this consciousness, by 1894 theories of child development became dominant, and the Child Developmentalist movement emerged in education thanks in part to G. Stanley Hall (Kliebard, 2004). In 1969, Robert Grinder (a professor of development and child psychology) noted that “[s]ocial scientists working in developmental psychology are indebted more to Hall than to any other person for the initial momentum, organization, and eminence of the discipline” (p.355).

⁶ Faculty psychology rested on the idea that the mind was composed of separate faculties.

Hall received the first PhD in psychology in 1878 from Harvard and then spent substantial time in Germany working at Wilhem Wundt's psychology laboratory. Hall's prominence grew as he established experimental psychology in the United States focusing his research on child development. Hall promoted the importance of a pedagogy that starts from what was considered to be developmentally appropriate for the child (Hall, 1904). Hall's version of child development theory was not the only child-centered theory elaborated at the time, but he was a significant figure and other child developmental theorists such as C. van Liew, James Mark Baldwin, and James Sully shared Hall's views (Fallace, 2012).

Hall's theory of child development was framed in what was known as recapitulation theory. Recapitulation theory can be summarized as the belief that human development progresses in a linear manner starting from a stage of savagery, barbarianism, and civilization (Fallace, 2012). It has been argued that many theories in the social sciences at the time were framed around recapitulation theory or eugenics (Stoskopf, 2002; Leonard, 2005; Yakushko, 2019). Within the recapitulation framework, Hall theorized a two-staged developmental trajectory based on race and individuals "which ran parallel to one another and collided in the production of civilized man and society" (Johnston-Goodstar, 2020, p. 379). Babies corresponded to the stage of pre-humans, children (ages 2-7) to the tribal period, juveniles (ages 8-15) to the medieval period, adolescents (ages 15-20) to the monarchical period, and man to the civilized societies of the West (Johnston-Goodstar, 2020) (Hall, 1901). According to Fallace (2012; 2015), this form of theorizing the psychology of child developmental was not unusual at the time. It was underpinned by the following reasoning that was widespread in the social sciences:

first, that all the societies of the world could be placed along a single, linear path leading through the sociological stages of savagery, barbarianism, and civilization; second, that all the individuals of the world could be placed along a single, linear path leading through specific psychological stages, third, that these psychological stages more or less recapitulated these sociological stages, and forth, that most people of color and their descendants were stuck in an earlier sociological-psychological stage of development (Fallace, 2012, p.78).

In retrospect, progressive ideas are often remembered as reforming practices for the well-being of society. It is important to acknowledge the rather troubling ideology in the work of Hall, and the history of this approach which is often claimed as a positive approach towards pedagogy.

The Social Meliorist movement

Improving the welfare of children was just one aspect of the social reforms in education during the Progressive Era. Changes in society at the time called for the school to take on a stronger role in the development of children who would become adult members in a democratic society (Steffes, 2012). Within this perspective, another prominent figure, if not the most prominent figure, in the Progressive Era emerged: John Dewey. Having graduated from Johns Hopkins University with a PhD in philosophy in 1884, he started a teaching position at the University of Michigan. He also worked at the University of Minnesota, prior to being recruited by William Rainer Harper to the University of Chicago in 1894.

Scholars at the University of Chicago were already engaged with social issues when Dewey joined. For example, Albion Small, head professor of social studies at the university addressed the National Education Association in 1896, criticizing the work of the Committee of Ten and lamenting that the curriculum they suggested was nothing more than a catalogue of subjects that failed to give a greater philosophical purpose for education. He called for an education that guided children into becoming members of society. He furthered this reasoning by stating that teachers should recognize the critical roles they play in society and, the sooner they assume these roles, the sooner they can begin the work of improving the future of society (Kliebard, 2004). Social meliorists like Small believed that schools were important institutions for eliciting social change. Students should be educated to their full potential, and that full potential was to become a citizen who strives to create a more just and democratic society.

It was with this scholarly backdrop in the University of Chicago, along with the realities of urban life in Chicago, that Dewey began to establish himself as a leader in philosophical, political, and pedagogical thought through his scholarship and work in as director in the University Primary School, later known as the Laboratory School in Chicago. In April 1899, Dewey gave three lectures to parents and the public about the University Primary School, its goals, and advances. Dewey opened the first lecture by stating that the changes that education was undergoing should be less individualist and focused on the progress of each student. Rather it should focus on a broader, social view. He argued that if we lose sight of this broader social view, changes in education will be nothing more than “arbitrary inventions or particular teachers; at worse transitory fads, and at the best mere improvements in certain details” (Dewey, 2017, p.5).

For Dewey, the purpose of the school was a place where a child was cultivated into becoming a democratic citizen. However, unlike mental disciplinarians, who believed that this cultivation comes from disciplining the mind, Dewey believed that this starts from the

school itself being “a genuine form of active community life” (Dewey, 2017, p.8) with the end goal being, “the development of a spirit of social cooperation and community life (Dewey, 2017, p.9). If schools are thought of in this way, they can then become institutions where students, “learn through directed living; instead of being only a place to learn lessons having an abstract and remote reference to some possible living to be done in the future” (Dewey, 2017, p. 9). The Deweyan perspective on schools as places to develop critical citizens for a democratic society stands in contrast to the Social Efficiency movement which I outline next.

Social Efficiency

Rather than schools aiming to develop critical citizens for a democratic society, the Social Efficiency movement positioned the school as a place to develop citizens that support the economy (Kliebard, 2004). Edward Thorndike was a leading thinker in this movement. Often juxtaposed with John Dewey (Soltis, 1988; Levin, 1991; Theobald & Mills, 1995; Tomlinson, 1997; Gibboney, 2006; Richardson & Slife, 2013), Thorndike was a highly influential psychologist who strove to legitimize the role of psychology in education. He believed that psychology “could provide the foundation for educational practices” (Tomlinson, 1997, p.369). Thorndike relied on psychological instruments of measurement (psychometrics) such as testing, data collection, and animal experiments to codify learning and create a science of learning.

Unlike Dewey, who believed that education’s purpose was to form democratic citizens regardless of their socio-economic status, Thorndike believed that education should be organized, efficient, and free of disdain for studies that have economic utility. For the majority of students any other form of education given to them would be a waste:

The one best reason for a frank acceptance of training for wage-earning as an aim of the schools is that for a large number of children the possibility of being a great benefactor of humanity, as teacher, physician, moral leader, or the like is nil. The kinds of work which they can do are limited to the kinds for which the world does pay. If one restricted their education to preparation for the loftier vocations, where the money-price is not the motive or the measure of the service, one would be given them an education unfitted to their capacities and to what the world needs of them (Thorndike, 1912, p.26).

Thorndike wanted children to learn only what was necessary for them to learn according to their innate capacities and their future economic utility. Nothing more, nothing less. I will explore this idea more fully in the next section when, together with the other thinkers outlined above, I begin to trace the developing *savoirs*.

During the Progressive Era, then, the purpose of the school was a central problem that the different educational movements attempted to address. Each progressive movement had their own interpretation of what should be the purpose of school, yet none provided an all-encompassing solution that would be able to meet the needs of everyone. Although traditional schooling was challenged, it seems that their philosophy in educating the masses to be critical thinkers was still compatible with the needs of modern society, or at least not as removed from the ideas circulating within the other educational movements.

Developing *Savoirs*: Framing the conduct of students and teachers

What the Progressive Era movements had in common was their reaction against mental disciplinarians, or traditional forms of schooling. Two main charges against traditional schooling were regarding subject matter and pedagogy. Traditional courses in history, literature, Greek, Latin, mathematics, and science were rejected as amounting to “little more than programs in which students accumulated facts and mastered theories whose presence in the curriculum was due more to weight of tradition than to any interest children might have in them or relevance to modern life” (Mirel, 2003, p. 481).

Those in the social efficiency movement believed that traditional subjects were “an impediment to the acquisition of the useful knowledge needed to play adult social and economic roles” (Labaree, 2005, p. 283) whilst child development and social meliorist proponents believed that they were “an imposition of adult structures of knowledge that would impede student interest and deter self-directed learning” (Labaree, 2005, p. 283). Pedagogy in traditional school was also seen as problematic because “teachers dominated the classroom, compelling and cajoling students to move through a pre-established curriculum” with small relevance to students daily lives, and whose main marker of comprehension was the ability of students to recite back the facts they were made to learn (Mirel, 2003, p. 482).

Progressive Era educational movements problematized traditional schooling to make room for modern solutions. Koopman describes the nominal dimension of problematization as, “render[ing] problematic certain old practices at the same time that they establish a basis for the elaboration of certain new practices” (2013, p.101). These new practices are now collectively known as *progressive education*: “a reaction against traditional structures and practices but with multiple ideological positions and programs of reform emerging” (Kliebard, 2004, p.287). These new *savoirs* may have developed from the various ways traditional schooling was thought to be inadequate for the modernizing American society.

However, a closer inspection of these movements shows that traditional schooling may have been unfairly caricatured: in some ways, their educational solutions were similar to those promoted by the different Progressive Era movements.

Student engagement and capabilities

During the elaboration process for the Committee of Ten, Charles W. Eliot identified two main problems that plagued the schools and colleges: the “lack of strong interest on the part of the pupil, and the lack of continuous strenuous exertion” (Eliot & Robinson, 1984, p. 370). Focusing on these two problematics that Eliot identified, we shall examine how Hall, Thorndike, Eliot, and Dewey attempted to obtain student engagement and address student capabilities. Pedagogically, Hall sought to move away from using traditional subjects to guide teaching and to support students to master their inherent impulses through reasoning. His main contention against traditional schooling was that it was too mentally demanding for the child with regards to their mental capacities. Hall wrote:

There are many who ought not to be educated, and who would be better in mind, body, and morals if they knew no school. What shall it profit a child to gain the world of knowledge and lose his own health? Cramming and over schooling have impaired many a feeble mind, for which, as the proverb says, nothing is so dangerous as ideas too large for it (Hall, 1901, p.25).

This belief led Hall to advocate a curriculum that revolved around the developmental stages he outlined (described in the previous section) and what he thought were the child’s innate interests.

Hall believed that children, upon entering school knew very little, and should be given objects to explore rather than introducing them to concepts such as the alphabet (Hall, 1893). Hall did not believe in the ability of the child to reason; thus, he promoted a curriculum that focused on play until the age of eight. At eight, reading and writing could be introduced, but rote learning and memorization should still be emphasized at this early stage of reasoning (Kliebard, 2004). Juvenile (ages 8-15) education should be focused on verbal memory, drawing, and music. Language should be heard and spoken rather than taught through grammar, writing and reading (Hall, 1901). Grammar, writing, and reading should come towards the latter stage of juvenile development. During this stage, he believed that making a child obedient is much more important than cultivating their ability to reason:

Reason is still very undeveloped. The child’s mind is at a stage when there is little in it that has not been brought in by way of sense. We must open

wide the eye-gate and the ear-gate. ‘Show,’ ‘demonstrate’ and ‘envisage’ should be our watchwords, not ‘explain.’ [...] We should explain very little. Even with respect to moral and conduct the chief duty of the child at this age is to obey. [...] If [obedience] is lacking, this is due to imperfect character or perverted methods in adults (Hall, 1901, pp. 32-33).

His lack of belief in the capacity of children meant that he did not believe that educational reform could improve children’s learning or skills (Brooks-Gunn & Duncan Johnson, 2006). His lack of belief in educational reform is counter to the other progressive movements. For Hall, it seems the main function of education was the preservation of childhood and instilling obedience in the child. Thorndike, on the other hand, found more utility in education, although he shared Hall’s lack of belief in the capability of all children.

As noted above, Thorndike believed that education should be limited to the capabilities of an individual and that attempting to provide everyone a high level of education would be inefficient and a disservice to society. He believed that the current model of education focused too much on the individual which created an environment that prevented “cooperative work” (Thorndike, 1912, p.33). Thorndike wrote:

The doctrine of individual perfection is inadequate because it gives an excuse for the too common tendency of men to educate themselves for the competitive display instead of cooperative work, because it opposes the specialization which is necessary for mutual aid, and because it neglects the fact that education beyond certain fundamentals should narrow itself to fit any given man for a certain probably course of life, not for all life’s possibilities (Thorndike, 1912, p.33).

Thorndike here seems to insinuate that educating people in the lower strata of society creates frustration and undermines the social order and prevents society from functioning within that order. “Cooperative work” seems to imply knowing your place within the social order and maximizing your economic performance to the service of that order. Tomlinson (1997) notes that Thorndike believed in a stratified society. More than just this, however, Thorndike seems to argue that an innate lack of capability in some individuals should be recognized. Once this is recognized, engagement in learning for those with a lower capacity can be achieved by only teaching things that are relevant to their immediate lives. Cooper-Tawney & Null comment that:

Thorndike is well-known for having created lists of the most commonly used words in various texts including the Bible. He wanted these lists to be used by classroom teachers as they generated spelling lists. Thorndike’s opinion was that children should only have to learn to spell words that they were

most likely to use during their lifetimes (Cooper-Tawnley & Null, 2009, p. 198).

A main charge against traditional pedagogy was its emphasis on rote learning, but both Hall and Thorndike advocated for rote learning (Hall, 1902; Thorndike, 1912). Unlike Hall and Thorndike who tended to have a reductionist view of education, Charles Eliot and John Dewey suggested an education that should be available to all believing that anyone has the capacity to achieve reasoning and critical thinking.

Condemning traditional curriculum in its inability to meet students' needs seems to imply that there was a lack of care or understanding of children, and what was more important to traditional educators was the conservation of traditional subjects regardless of its applicability. It is interesting to remember that unlike Hall or Thorndike, Eliot had a strong belief in the capabilities of all children. He was known to criticize how often students' capabilities were undervalued:

President Eliot is a faithful critic when he tells us that we habitually underestimate the capacities of our youth - reminding us most aptly that in Europe a young man must have faced the question of dying for his country at about the time when with us he faces with terror the ordinary college entrance examination (Mackenzie, 1894, p. 151).

Furthermore, rather than remembering traditionalists as gate keepers of an immovable educational cannon, we should think of them as individuals who were also attempting to grow their knowledge with the developments of their time. Eliot did not ignore the expanding interest centered around the child. Regarding childhood, Eliot (1904) writes:

Childhood and youth are the time for acquiring new mental processes and strengthening the memory. The child initiates new processes of thought and establishes new mental habits much more easily than the adult [...] The important thing in childhood is, therefore, to train the child in as large a variety of mental processes as possible, and to establish as many useful mental habits as possible. During this training an immense body of information will be incidentally acquired, but not so rapidly as the same person grown up can acquire it. [...] The important things to accomplish through education in youth are, therefore, the initiation of mental processes, and the establishment of good mental habits, with incidental acquisition of information (p. 264).

Regarding the curriculum he continues by stating:

children and young people should study the elements of a considerable variety of subjects, such as language, mathematics, history, natural science, sanitation, and economics, not with the primary purpose of obtaining information on those subjects, but in order that they may sample several kinds of knowledge, initiate the mental processes and habits appropriate to each, and have a chance to determine wisely in what direction their own individual mental powers can be best applied (p. 264).

Eliot believed in the ability of the child and strove to provide a curriculum that would work their mental capacities; however, how to engage students seemed to elude him.

Like Eliot, Dewey also believed that children were capable of critical thought and that there was a lot of untapped potential in children. Unlike Eliot, rather than imposing traditional subjects onto students, he believed learning starts from a child's interest and with proper guidance, help that child attach meaning to that interest and use that interest as a base to build upon mental processes and scientific knowledge. To illustrate his point, Dewey used many examples of children's impulses and how lessons were organized around those impulses for them to take their specific example and generalize it.

One example was cooking. Rather than following a recipe as a student suggested, the teacher asked what is the utility of this recipe and why was it made? The students then began to embark on multiple experiments with cooking eggs. They compared the components of the eggs with that of vegetables, which they had previously used to cook. Then they worked on an exercise to compare the components of eggs to that of animals – which they would cook later on. They then attempted to boil eggs in different temperatures and compared the results. Dewey explains:

The child to simply to desire to cook an egg, and accordingly drop it in water for three minutes, and take it out when he is told, is not educative. But the for the child to realize his own impulse by recognizing the facts, materials and conditions involved, and then to regulate his impulse through that recognition is educative. This is this the difference [...] between exciting or indulging an interest and realizing it through its direction (Dewey, 2017, p. 19).

In the University Primary School, curriculum was often derived from the curiosities of the students. From their curiosity derived inquiry and experimentation, leading to discovery and understanding. Dewey proposed that these activities mimic activities of adult life. They should result in a production of something, but not in the sense that students find value in what they produce. Their production should not be thought of in an economical sense. What the students produce should just help to make concrete the ideas that they have.

[I]n the school the typical occupations followed are freed from all economic stress. The aim is not the economic value of the products, but the development of social power and insight. It is this liberation from narrow utilities, this openness to the possibilities of the human spirit that makes these practical activities in the school allies of art and centers of science and history (Dewey, 2017, p. 10)

For Dewey, the potential of the school lies in between the idea of the student and the final product that the student has created from that idea. It is in this space where knowledge is acquired, ideas are challenged and reconstructed, and solutions are found.

In summary, both Hall and Thorndike had little belief in the ability of most children to reason, and school was not the place to develop this skill. Hall's concerns with children centered on preserving their naiveté or childhood. Hall and Thorndike were active members of various eugenics circles (Stoskopf, 2002; Leonard, 2005; Fallace, 2015; Fallace, 2016; Yakushko, 2019). It's important to make this link because it shows that in part the ideas and practices developed by these two key figures in education served to create or maintain a stratified society. There is, in these two movements an underlying belief that race defined the capabilities of a person, therefore anyone who wasn't northern European should be given limited education. Eliot did not find it necessary to have a clear path between what the students learned in school and how it will be directly applied in their future adult roles. Learning traditional subjects helped to develop one's mind and reasoning, and that was sufficient as this developed mind could be applied in a wide variety of situations. Finally, Dewey believed in the ability of all children to learn and that should be done by making the school into the democratic society we wish to achieve and by the developing the minds of children through the scientific method.

Capabilities of Teachers

Having focused on how the capabilities of children were perceived, I will now turn to the expectations regarding teachers' capabilities. The Committee of Ten's ambitious curriculum meant that qualified teachers would be needed for its implementation. During an exchange with a Committee of Ten member Oscar Robinson, a headmaster in a NY high school, he raised concerns to Eliot about the already difficult task of finding instructors at the high school level that would be capable of teaching traditional subjects, and it would be even more difficult to find capable teachers at the elementary school level if the curriculum were to be opened to a broader student population and started at a younger age (Eliot & Robinson, 1984). This was echoed by Mackenzie's remark concerning the suggestion by the committee of ten where he stated, "the gravest objection, in my mind, to this 'dipping down' process is the difficulty in securing properly qualified teachers" (Mackenzie, 1894, p. 151). Indeed, teaching traditional subjects like mathematics, philosophy, Latin, and Greek may have seemed a daunting task at the time, particularly since only those in the privileged class had access to that type of education. How willing would those graduates have been to accept to

teach in an elementary school with students who came from a family of factory workers? Instead of charging traditional curriculum with teaching methods that emphasized rote learning, perhaps the more probable reason the curriculum was reduced to rote learning was due to the lack of qualified teachers able to teach the demanding subjects.

Equally demanding, or arguably more demanding, were Dewey's expectations of teachers. Mirroring his theory on developing thinking in children using the scientific method, he believed that teachers should also use the scientific method to create lessons. Katherine Camp writes that teachers at the Dewey School must have mastery of pedagogy and content:

First, scientific method in itself; second, a sympathetic understanding of the springs of action of the child, united with knowledge of the content of the different sciences. One essential thing to be insisted upon is the teacher's ability to recognize the purpose of hypothesis or theory, as merely outlining present knowledge and to be held always flexible, ready for readjustment, or even abandonment, whichever should be demanded by scientific growth and development (Camp qtd in Durst, 2010, p. 68).

At one point, the Dewey school changed its name from University Primary School to the Laboratory School, and although the change of name was not anticipated, it was welcomed as Laboratory School suggested better what the school entailed. Research was a fundamental aspect of the Laboratory School. Teachers at the school would contribute to research using what they experienced in the classroom and published in educational journals. Also, reflection on pedagogy was continuous in the school, as teachers met regularly to discuss methods, students, and made decisions collectively regarding instruction. The research and scientific mindset they worked towards in the Laboratory School was that of creating, testing through practice, and revising based on results. Teachers had the ability to work through their own 'research practice' whilst having colleagues that they could discuss with in to improve their 'research practice':

Too much emphasis cannot be laid on the constant and intelligent attempts to put into classroom use, and thereby test, the theory of the school. The success or failure of these attempts occupied to a great extent the weekly teachers' meetings...Although the immediate decision with regard to treatment of subject-matter and method was left to the individual teacher, each teacher's method was so checked and rechecked by cooperative discussion of results and effects on children, that changes in viewpoint continuously took place (Durst, 2010, p. 66).

Profound reflection on pedagogy was taxing on the teachers, and they acknowledged that teaching at the Dewey School demanded great rigor and commitment:

The broad and easy ways of conventional teaching lured the teachers to seemingly pleasant travel. Continually must they be on guard against the temptation to select the old, easy, and habitual forms of activity for which

ready-made materials were at hand, rather than one that required search for new materials and careful thought (Durst, 2010, p. 65).

It is unsurprising that both Eliot and Dewey understood the value of capable teachers given that they had high expectations of learning for students. Curiously Thorndike acknowledged the central role teachers play in the education system arguing that teachers should be both better paid and better educated, as “a nation which lets incapables teach it [...] is committing intellectual suicide” (Thorndike, 1912, p. 247). He likened teachers to engineers and went even further by stating that teachers are engineers of humans which is a much more complex and difficult task than a mechanical engineer. However, he does acknowledge that if in the future, teachers become engineers, other tasks could be turned over to less qualified individuals. Thorndike states:

Very soon, six and then seven, and then eight years, beyond the elementary school will be required of entrance to the profession of teaching. Some of the mechanical work of changing human nature may be turned over to individuals of less training, as the engineer turns over certain routine construction to carpenters, masons, or machinists. But the real teacher, the architect of human lives, will soon be required to possess at least such expert knowledge and skill as only a first-class student can gain in a full four years beyond high school [...] this knowledge will include rigorous scientific treatment of the problems of education itself. (Thorndike, 1912, p. 258)

Thorndike may have likened teachers to engineers, but we shall see in the following section the low-level teachers are positioned in the administrative educational hierarchy.

Hall, on the other hand, did not believe teachers needed to be learned. Perhaps, due to his belief that a rural environment was superior to an urban environment with regards to child development, his description of an ideal teacher resembles that of a teacher in a one-room schoolhouse. For Hall, the role of the teacher is more linked to preserving community values and knowledge of traditional subjects was not necessary (Mydland, 2011). Hall stated that:

the ideal teacher [...] will be the captain of the child’s soul; will be able to do some things with his or her body that the child cannot; will be able to answer most of the questions suggested by the field, the forest, the beach, the street, and their denizens; will suggest and umpire games; will perhaps know a little of coaching, but will be a stern disciplinarian [...]; will love occasional excursions and expeditions; will perhaps sing, play, and draw a little; will be able to do something expertly well; and, as perhaps the culminating quality, will have a repertory of the greatest stories the human race has ever told or heard (Hall, 1901).

Having reviewed the differing ideas regarding student engagement and student and teacher capabilities, it becomes less clear as to why such a strong distinction between what

was traditional and what was progressive was made. Why then does the line between traditional and progressive must be drawn? Foucault argues that one point of analysis in power is the “systems of differentiation.” It “permits one to act upon the action of other [...] Every relationship of power puts into operation differentiations which are at the same time its conditions and its results” (Foucault, 1982, p. 792). The traditional curriculum was the dominant ideology practiced by the elites at the time. The new movements in education that emerged during the Progressive era, now thought of as a singular block because of its common attack on traditional education, were multiple movements each with their own specific attack on traditional schooling. These tiny battles that traditional school fought from multiple fronts eventually began to tatter its edges and delegitimized its status in education. As traditional school lost legitimacy, there was room for progressive education to gain legitimacy.

The attacks on traditional education continue to present day. The continued existence of “traditional education” or the belief in its existence is necessary for any “new”, “modern”, “progressive” or “innovative” form of education is to exist. Koopman (2013) identifies this form of differentiation as “reciprocal incompatibility.” Reciprocal incompatibility is

The logic of modernity in which reason must preserve madness as its other, in which clinical medicine must isolate health from illness while at the same time requiring the preservation of illness as the abnormal other against which normal health can be recognized, and in which punishment must preserve criminality rather than eliminate it in order to justify the continued need for the entire punitive apparatus (Koopman, 2013, p.164).

Reason cannot exist without madness and discipline cannot exist without liberation. And any new conception of education, whether it be progressive, modern, new, or innovative cannot exist without tradition. Reciprocal incompatibility “can neither be fully liberated from another nor totally assimilated to one another” (Koopman, 2013, p. 164). Traditional education has continued to be attacked and delegitimized, but it can never be eliminated. Even though there are some overlaps in the ideas that traditional education has with some ideas within the progressive movement, it could never be positioned as being part of that movement.

From *Savoirs* to *Connaissance*:

Hall, Thorndike, Eliot and Dewey all postulated their theories on learning and education reform, and in retrospect each proposition had their merits and disadvantages depending on one’s rationale behind the purpose of education and how students learn. This brings me to question the conditions in which the ideas within the social efficiency movement, and

particularly the Thorndikean approach to learning and education became so prevalent. As management science and experimental psychology developed in the early 20th century, claims arose from these fields that each could underpin approaches to education. This section will discuss these two fields, experimental psychology and management science, and explore how they dovetail to form a vector of power enabling Thorndike and those within the social efficiency movement to gain legitimacy in the field of education. As Tomlinson writes (1997, p.365), Thorndike “showed how schooling could be structured around the methods of industrial management” developed through scientific management and behavioural psychology.

Experimental Psychology: Thorndike’s Theory of Learning

Not all knowledge can be given to all men (Thorndike, 1912, p. 40)

Thorndike developed a theory of learning drawing on behaviorist approaches to learning as responses to a stimulus. For Thorndike, learning was achieved through repetition and positive association. The more an act is completed and given positive response, the more likely this will act will be retained (see Thorndike, 1912). In the inverse, if the desired outcome is to eliminate a specific behavior, it should not be repeated, and any instance of this act should be met with a negative association (Thorndike, 1912). Based on this theory of learning and his social view, Thorndike believed education should be a means to mold people’s beliefs and attitudes for the betterment of society (Franklin, 1976). Arguably, Thorndike’s theories of learning (in the field that became known as behavioral psychology) represented the first iteration of outcomes-based learning.

An extension to Thorndike’s theory of learning was transferability, and this extension and development in experimental psychology contributed to the decline of faculty psychology (based on the idea that the mind could be separated into different faculties). It also led to the removal of traditional subjects in the high school curriculum, and a movement of curriculum to be more closely aligned to skills needed as an adult. Ralph W. Tyler, who I will explore in the next chapter, was highly influenced by Thorndike’s theory and states that a key moment in curriculum theory was when Thorndike was able to demonstrate the fallacy of the idea of transfer of knowledge which had been an important claim in faculty psychology. Tyler wrote:

When Thorndike’s studies demonstrated that students who completed courses in geometry were no better at solving logical problems than were students

who had not taken geometry, and that students who completed courses in Latin were no better in their English composition than students who had not taken Latin, it was clear that the traditional justification for the subjects in the curriculum could no longer be accepted. Thorndike maintained that there must be identical elements in what was encountered outside of school in order for students to apply what they were taught. He referred to this as transfer of training (Tyler, 1986, p.36).

The rise of this more scientific approach to psychology would also lead to criticism of Hall. Even though Hall rose to prominence because he was perceived to bring a more scientific influence into education, his devotion to recapitulation theory began to discredit him amongst his peers, particularly those practicing experimental psychology (Young, 2016). Halls attempts to study the difference between what was instinctual and what was learned behavior was lambasted by his peers for being “unscientific and anecdotal” (Tomlinson, 1997). Smuts (2006) argues that experimental psychology's “insistence on a neutral, objective, value-free approach was even less compatible than its methods with Hall's expansive, exuberant temperament and his need to pursue religious and ethical goals” (p. 37).

Like Thorndike, Dewey believed in the application of psychological science in education. However, he was not convinced of the burgeoning psychological tools and theories that were used by Thorndike and likeminded peers (Giboney, 2006). Rather than using science to determine where the child belongs in society, Dewey believed that the scientific method represented a rationality that could be taught to everyone as the key to unlocking critical thinking. Tomlinson writes:

Where Thorndike presented science as a technical pursuit limited to superior minds, Dewey saw it as a universal method of deliberation everyone could and should employ. Indeed, Dewey observed, the rational values implicit in the scientific method were nothing less than the moral norms of democratic life. (Tomlinson, 1997, p. 375).

Unlike Hall and Eliot, whose scientific standing was diminished by Thorndike's Theory of Learning, Dewey's status as a professor in the philosophy department at Columbia University gave legitimacy to his ideas and philosophy on education. Although Dewey was not part of the influential Teachers College like Thorndike, those who studied within the education department at Columbia had contact with Dewey and were influenced by his educational philosophy and practice. The thinking of these two men would lead to two types of progressivism: administrative (influenced by Thorndike) and pedagogical (influenced by Dewey) (see Labaree, 2005).

Scientific Management and the rise of administration

Business historian, Alfred D. Chandler (1984) argues that, after the Civil War and industrialization in the turn of the century, a new form of capitalism developed called *managerial capitalism*. The expansion of the railway system along with the growing sophistication of technology in various industries came with it the expansion of companies in these industries and, “the creation of large managerial bureaucracies within national corporations” (Maggor, 2017, p. 205). Prior to managerial capitalism, the owner of the company also managed the company. However, as industrial giants such as Carnegie Steel, Standard Oil, General Electric, expanded their business activities – retail, procurement, marketing, operations, accounting, etc. – a new managerial hierarchy was created and a new type of employee was formed: the middle manager (Chandler, 1984). Middle managers “supervised a particular division within a firm and whose qualification were primarily technical and administrative” (Maggor, 2017, p. 205). As companies became multidivisional, they, “facilitated the accelerated flow of unprecedented volumes of goods, realizing large economies of scale and making the relentless search for order into the organizing logic of American society” (Maggor, 2017, p. 205).

New developments in capitalism and *The Principles of Scientific Management*, published in 1910 by Frederick W. Taylor, strongly influenced social efficiency scholars in education (Labaree, 2005). Using scientific management as their rationale, social efficiency scholars, particularly in urban environments, created a hierarchical administrative school system. The social efficiency movement was led by scholars such as Thorndike, David Snedden, and John Franklin Bobbit amongst others, who were professors in leading educational institutions like Teachers College (in Columbia University) and the University of Chicago. The movement became supported by the students that studied under these social efficiency educators: Labaree highlights that many students became “deeply involved in the schools as administrators, policymakers, curriculum developers and educational researchers” (2005, p.285).

Those who held these key roles in the administrative school system were likened to the supervisors and managers of a company. It would be their responsibility to “gather all possible information about the educational process and develop the best methods for teachers to get students to meet the standards” (Au, 2011, p. 27). One form of information came via

psychological tools developed and promoted by Thorndike, but other forms of information gathering came via “‘school surveys,’ studies of school enrollments and facilities that resulted in recommendations for school improvement” (Urban & Wagoner, 2013, p.181). Research and results of school surveys were commissioned by both public institutions such as the U.S. Bureau of Education, and private institutions such as universities, Rockefeller’s General Education Board, The Russel Sage Foundation, and the Cleveland Foundation. Innovations in education were often implemented as a result of these surveys (Tyack, 2010).

Where social efficiency advocates like Thorndike made a significant impact in education was in their “means of bringing power relations into being” (Foucault, 1982). The creation of a hierarchical administrative educational system allowed them to control and shape the direction in which education developed. This new administration became networks of power where individuals, in their application of different social efficiency reforms and innovations, exercised power (Foucault, 2003). The more this power was exercised, the more legitimate the social efficiency movement became. However, Gamson (2003) argues that the district superintendents were not interested in the divisions between competing thoughts of progressive ideas in education. The main distinction they made was “between the practices of the past and the practices of the present” (Gamson, 2003, p.427). The superintendents therefore regarded any “progressive” thinker as “an ally and any classroom practice that departed from the uniformity and the rigidity of the nineteenth century was to be embraced” (Gamson, 2003, p.427).

Gamson (2003) cites three school districts (Seattle, Washington, Oakland California, and Denver Colorado) as examples of superintendents bringing together seemingly contradictory perspectives on progressive education. The district leaders had commonalities in their interpretation of progressive: a strong belief in elements of administrative progressivism such as IQ testing, measurement, and classification which were innovations linked to social efficiency. These tools allowed school districts and schools to be surveilled and instilled a culture of competition amongst them. Modern tools of measurement and surveillance advocated by educational psychologists at that time were being used to inform decisions on how schools should be governed. They also implemented some curriculum teaching ideas based on pedagogical progressivism (for example, project methods of learning, and learning through play) (see Gamson, 2003).

However, the rise of administrative progressivism as a form of educational governance tended to subjugate the knowledge and practices (*savoirs*) of teachers. In urban schools, prior to hierarchical administrative educational system, the promotion of teachers based on experience was developed. A teacher started as a substitute, then became a full-

time teacher of the lowest grade, and made their way up the grades as they gained more competency in teaching and positions opened, until they taught 7th grade and became a vice principal, and finally teaching 8th grade and principal - meaning that they were the principal teacher of the school (Urban & Wagoner, 2013). The years of experience and understanding of community needs as a teacher, were delegitimized with the creation of a hierarchical administrative educational system. In Oakland, for example,

teachers established 'ungraded rooms' where...they could assist those individuals students who educators found had fallen behind due to a variety of reasons, usually unrelated to the school, including prolonged absence or truancy, illness at home, or frequent change of schools...[T]he source of the academic problem could be identified as the student's inability to comprehend a core concept in one or two subjects as quickly as the rest of the class (Gamson, 2019, p.5).

Unfortunately, responses to student needs such as this were not part of the cutting-edge trend/ Superintendent Hunter of Oakland, California, largely ignored the findings of the teachers in preference for principles of administrative progressivism. However, in the new administrative progressivism, Thorndike and other social efficiency educators' mechanistic vision of education ignored "the creative, sentient, and culturally embedded character of human experience' (Tomlinson, 1997, p.367) for both students and teachers alike.

This form of educational governance also subjugated practices that allowed for open-ended solutions. For example, in preparing the report of the Committee of Ten, Eliot wanted to give *suggestions* for curriculum change, rather than finalities. He was even wary of going as far as giving suggestions given the complexity of education and schooling: "We may find it necessary to do nothing but give an account of how the conferences were organized, and then present their work without recommendations of our own" (Eliot and Robinson, 1894, p.369). Dewey also believed that the complexities of learning meant definitive solutions should be avoided, and promoted the development of a curriculum that could be modified based on the changing needs of students, community, and society. However, it seems that rather than allowing for a complex solution to a complex problem, social efficiency advocates preferred a universal solution that minimized the real complexities of the social problems and educational responses.

The creation of a hierarchical administrative educational system resulted in the loss of power for the community and the individual. Steffes (2012, p.50) writes that the school district as "the smallest unit of self-government in the United States" reflected "the strengths of American democracy; it was highly local and participatory". However, promoters of the new system of educational administration wanted to transfer local control of schools to a

“centralized board and expert superintendents under a corporate model of governance” (Tyack, 2010, p.56). This led to communities no longer being able to hire teachers that shared their social, religious, and ethnic backgrounds, as well as giving communities no say in curriculum content such as religion or languages taught (Steffes, 2012).

Teachers also lost power in this new administrative structure. Even though Thorndike acknowledged the crucial role teachers played in society, eventually it was the teachers who became the technicians in the school administration system. Those with non-teaching roles such as superintendents, principals, vice-principals, attendance officers, directors of vocational education, etc. became the engineers. “Teachers were thus incorporated into the bottom ranks of a developing hierarchy that sought professional status” (Urban & Wagoner, 2013, p.184). Regarding teaching in a progressive manner, Ida Vandergaw, teacher and supervisor of the primary grades in the Oakland Schools remarked:

The majority [of teachers] have acquainted ourselves with the theories underlying modern progressive educational ideals and methods...We admit we should train children for the effective happy living in a democracy; we agree that each child should be given that which meets individual needs. We have been told that to secure our objective there must be on the part of the student whole-hearted, purposeful activity in a social situation. But and here's the rub, how shall we secure this inner urge that 'defines the end, guides the pursuit, and supplies the drive?...How shall children's interest be made the basis for activities of large educational value? With the rest of the progressive educational world we know the theory, but we are not sure of the technique of method (quoted in Gamson, 2003, p.428).

Perhaps admitting confusion on how best to implement a progressive curriculum was a contributing factor in the perception that teachers were incapable of teaching according to the new ways. Frank Cooper, superintendent of Seattle Washington stated teachers, “had drilled into them so long the idea that pupils must memorize facts set forth in a textbook” that they found it very difficult to teach in a different way (quoted in Gamson, 2003, p.427). However, school districts did not adequately provide a quality education to their teachers on the new progressive approaches, which were themselves based on contradictory ideologies, may also have contributed to teachers finding it difficult to teach in a progressive way (see Gamson, 2003).

Conclusion

This chapter has untangled the beginnings of influential educational ideas that have become embedded in contemporary American educational discourse. Through this untangling I have

shown how four key educational movements had differences as well as overlaps in their philosophies and in their attempts to address the purpose of education in a changing society. These educational movements were underpinned by existing discourses such as capitalism, eugenics, and democracy. As these movements tried to respond to the changing purpose of education, ontological and epistemological tensions can be noted. Historicizing these ideas and practices from these movements allows us to better understand why our contemporary ideas, attitudes, and practices that stemmed from these different movements can sometimes feel conflicted.

Additionally, as I have highlighted, the knowledges and practices that were subjugated by the newly developing educational administrative system and the administrative progressivism with which it was associated. Although local knowledges existed in the “old” education system through teachers and traditionalists, these knowledges were likely to be ignored or dismissed if they were not in line with the ideas driving the development of the educational administrative system. The hierarchy created in this educational administrative system meant new agents were able to exercise power in the field of education. These agents become important as we shall see in the next chapter. The progressive approach to education, as it became accepted in its various forms, meant that what became seen as traditional education was delegitimized and the *savoirs* of student engagement, and student and teacher capabilities emerged. These *savoirs* developed over time into *connaissance* through the work of Tyler, Taba, and Wiggins and McTighe, as I explain in Chapters 4, 5 and 6.

Chapter 4: Ralph W. Tyler

Introduction

Foucault argues that an intellectual plays a significant role in the apparatus of truth because he is part of the battle *for* truth. Foucault (1980) defines truth as the “ensemble of rules according to which the true and the false are separated and specific effects of power attached to the true” (p. 132). He further clarifies that this battle for truth is, “a battle about the status of truth and the economic and political role it plays” (Foucault, 1980, p. 132). The intellectual can be thought of as being part of a machine. However, unlike the cog that we often imagine when we reference the part of a whole that an individual represents in a company, the role the author plays is not stagnant. This machine is continuously being shaped and reshaped by its parts as it shapes and reshapes the parts within it. This machine is “truth” (Foucault, 1980). This chapter will examine the role that Ralph W. Tyler plays in this machine, or “regime of truth” (Foucault, 1980).

This chapter will focus on Tyler’s *Basic Principles of Curriculum Design*, or the Tyler Rationale, which played an important role in establishing the regime of truth that is outcomes-based learning. Before discussing the Tyler rationale, I will first look at the historical context that influenced the development of the Tyler rationale. This historical context will also discuss the place of curriculum specialist and their role in legitimizing the Tyler rationale. To illustrate the influence and impact of these specialists, I will discuss the legacy that Tyler had. Through this legacy, Tyler’s particular view of learning became a regime of truth.

The critical questions that guided this chapter were as follows: *How were the various educational movements perceived at the end of the Progressive Era? Who was Ralph W. Tyler and what was the Tyler Rationale? How was the Tyler Rationale able to conduct the conduct of curriculum development?*

Historical Context: New beginnings at the end of the Progressive Era

According to Tyler, the “period between the two great world wars was one in which the systematic curriculum-building emerged as a major part of educational theory and practice” (Tyler, 1971, p. 44). Recruitment during World War I found that as many as 60 percent of white males were illiterate or physically incapable of being recruited into the war (Steffes,

2012). This was interpreted as a failure of the American school system by many Americans (Steffes, 2012). This further fuelled the movement, started in the progressive era, to change the school curriculum.

During World War I, Thorndike was able to apply much of the psychological tools and methods he developed, particularly the use of IQ tests, for military placement (Stoskopf, 2002). Because of its success, it was adopted on a more general scale within the school systems (Stoskopf, 2002). Individualized learning by catering to the abilities of the learner and waste prevention in education were two arguments used to promote IQ testing in schools (Steffes, 2012). Through these tests, Thorndike's brand of progressivism continued its influence in education, particularly in its systematic and bureaucratic nature (Levin, 1991).

Other Progressive Era thinkers were also searching for a clearer pathway towards improving education. The Progressive Era generated numerous innovations in pedagogy that eventually needed structuring. In 1926, leading experts of curriculum development, such as William C. Bagley, Franklin Bobbit, W.W. Charters, George S. Counts, Ernest Horn, Charles H. Judd, William H. Kilpatrick, and Harold Rugg (chairman), published *The Twenty-Sixth Yearbook, The Foundations and Technique of Curriculum Making*. In the preface, the editor of *The Twenty-Sixth Yearbook*, Guy Montrose Whipple, stated that the purpose of the publication was to address the problems of curriculum development, It would do so by "making a special effort to bring together, and as far as possible to unify or to reconcile, the varying and often seemingly divergent or even antagonistic philosophies of the curriculum that were being espoused by leading authorities or by their adherents in this country" (Whipple, in Tyler, 1971, pp. 27-28). The search to find a method to bring together the various pedagogical movements from the Progressive Era was a challenge Tyler was keen on solving.

During the 1920s, states gradually obtained more control over the management of schools particularly in urban districts. However, rural districts were still largely locally governed and funded, although in the years following the Great Depression, states did begin to gain more control in rural districts. However, lack of employment meant an increase in student population in high schools which aggravated the already underfunded rural schools (Urban & Wagoner, 2013). As local taxpayers were unable to maintain the functioning of schools, districts turned to the state for financial help. With this financial help came appointments for specialists to improve school conditions. Steffes writes, that state rural supervisors "framed their roles as mentors and boosters for local reform" (2012, p.91). These "new agents" of the state department of education "guided districts to state and professional standards and reform priorities" (Steffes, 2012, p. 91). The administrative educational hierarchy was not as developed in rural districts, but the presence of state rural supervisors

coupled with audits and recommendation reports influenced how schooling was shaped (Steffes, 2012).

During this time, the status of teachers did not evolve nor did their professional development. On the contrary, in many aspects it worsened. In *Curriculum Development in the Twenties and Thirties*, Tyler (1971) highlights passages from the Twenty Sixth Yearbook that suggests that the role of teachers should be minimized, and the work of curriculum development should be done by those with expertise in that field. Harold Rugg and George S. Counts, members of the Twenty Sixth Yearbook committee wrote:

For the skill subjects in which careful scientific experimentation has been conducted over a number of years, a school system can do no better than adopt the best textbook available (Rugg and Counts quoted in Tyler, 1971, p.36).

Their point of view concerning who should create curriculum is not surprising. Between 1920 – 1940, Harold Rugg created a vast curriculum in Social Studies amounting to 25,000 pages and reaching 5,000,000 children (Muschinske, 1974). Urban and Wagoner point to an analysis made by Willard Waller, an educational scholar, who remarked on what he saw as the mediocrity of teachers:

Waller found teachers to be predominantly... from rural areas, and from lower-middle-class families. While he was not sure what these characteristics meant in terms of teachers' occupational behavior, he concluded that mediocrity was a viable characterization of their lives and work (Urban and Wagoner, 2013, p.249).

Urban and Wagoner (2013) further state that World War II had a significant impact on the quality of teachers. Not only did male teachers leave the schools for war, but women teachers left schools to pursue more lucrative employment in factories. The absence of qualified teachers, along with the growth in curriculum development, presented the necessity of having curriculum specialists, or at the very least, people who were knowledgeable in the science behind curriculum development. Ralph W. Tyler would be one such specialist whose influence became highly significant.

Ralph W. Tyler: The beginning

Ralph W. Tyler began his career in education at the age of 19 after he earned his degree from Doane College, Nebraska. He soon left having found the task of teaching such a diverse population too difficult. He said:

Trying to help such a motley group of young people learn science was so difficult that after a year or two I went to the University of Nebraska to get more education and ultimately I became responsible for the education of science teachers at that university (Tyler quoted in Grier, 1995).

He completed a Master's in educational psychology at the University of Nebraska 1923 but also became interested in curriculum development. He was encouraged to pursue a PhD at the University of Chicago where he worked and studied with George S. Counts, Charles H. Judd, W. W. Charters, and Franklin Bobbitt (Antonelli, 1972). He then worked as a member of the University of North Carolina faculty and afterwards Ohio State University where he began to formulate his ideas on curriculum design.

He was appointed as the Director of Research for Evaluation of the Eight-Year study which took place between 1933-1941. According to Tyler, this study was one of the two major landmarks in his career (Kiestler, 1978). The Eight-Year study may be interpreted as another battleground for traditional versus progressive ideologies. Colleges and their admission standards were blamed for the continued use of a traditional curriculum that emphasized specific academic courses and units of study (Kahne, 1995). The purpose of the Eight-Year study was to examine to what extent a progressive curriculum in high school could prepare students for college compared to a traditional curriculum. Tyler stated that the progressive curriculum, one that was "build on interest to get an effective program," gained popularity among high school principals whose children from middle and upper-middle class backgrounds came from progressive elementary schools (Tyler, 1986, p. 16). Another group of students that could benefit from a non-traditional curriculum were those who were not college-bound (Tyler, 1986). With the growing number of students entering high school due to the lack of jobs caused by the Great Depression, there was a push to create a curriculum for both college and non-college bound students (Kiestler, 1978). The objective of the study was to demonstrate that when freed from the constraints of college requirements educators could create a curriculum that responded to the problems and issues face by youth, thereby representing a more democratic approach to study and schooling (Kahne, 1995).

To complete the experiment, colleges lifted their requirements from the 29 schools participating in the study, allowing schools the liberty to craft their own curriculum. Far from being democratic, most of the schools that participated in creating a progressive curriculum were private elite high schools; others were affiliated with universities or were in affluent suburban neighbourhoods, and only a small percentage could be considered typical high schools (Kliebard, 2004). At the very least, the study showed that the students in the study did just as well as those who followed a traditional curriculum (Urban &

Wragoner, 2013). However, due to the second world war, priorities in education shifted, and the results of the Eight-Year study were not pursued.

Tyler was chosen to be Director of Research for the Evaluation of the Eight-Year study because of his then novel idea of linking evaluations to general objectives, rather than creating tests to recall facts (Kiestler, 1978). According to Breslor (2001), prior to Tyler, tests in America were based on a statistical variance whereby student test scores should fall within a normal distribution range. Tyler argued that the point of evaluations should not be to achieve a normal distribution, rather an evaluation should measure to what extent one is able to meet a given objective. Breslor (2001) comments:

This now obvious insight provided a paradigm shift in our conception of what tests were for and what appropriate test construction criteria needed to be. A test in which all students responded correctly to all items would have no statistical reliability under conventional testing assumptions, but they would be educationally relevant if one were engaged in criterion referenced testing. This shift in perspective is a fundamental one (Breslor, 2001, p. 56).

Much like the way in which Thorndike's transfer of learning theory delivered a blow to traditional schooling by delegitimizing the faculty psychology on which traditional schooling in America was based, Tyler's objectives-based evaluations delegitimized the practice of evaluation as it was used in traditional schooling. This delegitimization would be further deepened by Tyler's doctoral student Benjamin Bloom who classified behavioral objectives into a taxonomy, facilitating a more direct link between objectives and evaluations.

Although Tyler has been linked to social efficiency and to behaviorist theorists such as those promoted by Thorndike, Bobbitt, and Charters (Paraskeva, 2011), for this genealogy I will also emphasize the associations that Tyler had with Dewey. Some scholars claim that Tyler was influenced by Dewey (Hlebowitsch, 1995), while others do not (Kliebard, 1995). Kliebard contends that the Tyler rationale of curriculum planning cannot be seen as Deweyian because of the finality in Tyler's learning objectives. Once a student has achieved (measurably) an objective it is the end of the learning process in terms of that objective. For Dewey, the achievement of an objective is just a 'turning point' in the lesson (Kliebard, 1970). This means that there is no finality to the learning. It is continuous process based on how the child responds to the given environment they are in. Kliebard insists that for Dewey it is the activity that is at the center of learning rather than the objective itself.

However, Tyler himself noted that he shared Dewey's perception of the importance of learning experiences for children. While perusing John Dewey's logs that had been left in the Laboratory School of Chicago, Tyler read and agreed with a note that said:

It is clear to me that the main limitations in learning in schools are not the limitations in the intelligence of the children but the limitations in our inventiveness in devising learning experiences that stimulate and challenge them (Dewey quoted in Keister, 1978).

Other influences Dewey may have had on Tyler are outlined by Stone (1985). Firstly, Tyler builds upon Dewey's definition of education and emulates Dewey's example of building theory from practice. Stone (1985) also argues that Tyler extended Dewey's scientific approach to education and utilized Dewey's learning theory. To what extent these associations are truly Deweyian, will be discussed in the next section. What is important to note for now is that Tyler and interpreters of Tyler link themselves to Dewey, thus creating legitimization for Tyler's theory and practice. This linkage to Dewey can also be found in Taba and in Wiggins and McTighe.

After the Eight-Year study, Tyler was appointed as chairman of the Department of Education in the University of Chicago where he created the Education 360 curriculum that was later published as *Basic Principles of Curriculum and Instruction*. Meant for students studying curriculum theory, Tyler wrote the Basic Principles as a course syllabus, which soon became the bible for curriculum making (Kiester, 1978). These students, who would later become curriculum experts, were important agents in the legitimization of the Tyler Rationale. They became the producers, regulator, distributors, circulators of the Tyler Rationale, multiplying its power effect sustained its legitimacy (Foucault, 2003).

Tyler's legacy: Conducting the conduct of curriculum development

Tyler's career spanned three-quarters of the twentieth century. He lived from 1902-1994 and was influential for a significant proportion of that time. According to Tyler, next to the Eight-Year Study, the second major landmark in his career was his appointment as director of the Center for Advanced Study in Behavioral Sciences at Stanford University in 1953 (Kiester, 1978). Goodlad (1995) comments that Tyler's work in this center represented "his greatest influence on educational research from virtually every perspective: economic, political, social, historical, philosophical, comparative, anthropological, methodological, and aesthetic" (Goodlad, 1995, p. 80). Tyler's influence on the US government was expansive. He had various roles as an educational advisor under seven presidents: F.D. Roosevelt, Truman, Eisenhower, Kennedy, Johnson, Nixon, and Carter (Parks, 2010).

Tyler's legacy also lives through the works of his colleagues and doctoral students. Stone (1985) traced twenty-five notable curricular theorists and experts that were influenced

by Tyler from the years 1930-1980: Edgar Dale, Lily Detchan, Louis Heil, Louis Rath, Harold Shane, Benjamin Bloom, Lee Cronbach, John Goodland, Hilda Taba, Herbert Thelen, Edgar Friedenberg, Chester Harris, Earl Johnson, David Krathwohl, Christine McGuire, Kenneth Rehg, Ole Sand, Louise Tyler, James Wilson, George Barton, Paul Diederich, Harold Dunkel, Maurice Hartung, Virgil Herrick, Joseph Schwab. Many of these curriculum experts were either colleagues or his doctoral students at the University of Ohio or the University of Chicago and worked with Tyler through research projects such as the Eight-Year study or the Cooperative Study. Others worked with him at the Examiners Office in the University of Chicago, or worked with him at the Center for Advanced Study in Behavioral Sciences. Hilda Taba will be discussed in the following chapter, but it is worth mentioning Benjamin Bloom, Tyler's doctoral student at the University of Chicago.

Bloom's Taxonomy is widely used across the United States by teachers in curriculum planning. Created by thirty-four educators, psychologists and school examiners between 1948-1953, Booker states that their intention was "to provide an overarching classification system for test questions— questions that would fit into a larger project of educational goals and measurements" (Booker, 2007, p. 349). The work of Bloom extended Tyler's objectives-based evaluation approach based on observable (learning) behaviours (Stone, 1985). It classifies behavioral objectives into a taxonomy in the cognitive, affective, and psychomotor domains, though a book for the psychomotor domain was never published. Booker comments that "Bloom's committee advocated an approach to assessment that yoked explicit classroom outcomes to clear and demonstrable behaviors which could be tested" (Booker, 2007, p. 350).

The idea was that the taxonomy should guide instruction so that students move through the different levels of the taxonomy to achieve mastery in what they are learning. This conception of instruction and evaluation is in opposition to the assumption "that there would always be a normal distribution among students and that this distribution and the students' location within it should determine their rewards distributed in the form of grades" (Eisner, 2000, p. 390). Tyler and Bloom's understanding of evaluation, and the science that they developed to support their view of evaluation, subjugated the practice of statistical analysis in evaluations. Arguably, evaluating students work based on statistical analysis allows for more open-ended forms of evaluation, or at the very least is an alternative to evaluations based on objectives that has come to be the standard in American education today.

The Basic Principles of Curriculum and Instruction: The Tyler Rationale

Tyler's (1949, p. 1) *Basic Principles of Curriculum and Instruction* centers around five main questions:

1. What educational purposes should the school seek to attain?
2. How can learning experiences be selected which are likely to be useful in attaining these objectives?
3. How can learning experiences be organized for effective instruction?
4. How can the effectiveness of learning experiences be evaluated?
5. How a school or college staff may work on curriculum building?

The first question is where the main emphasis of the book is placed. Here Tyler discusses the different ways to identify and define the educational purpose of the school. He divides this thinking into two main parts. The first part asks, "How to obtain objectives?" and Tyler suggests that three main sources should be used to do this: the learners, contemporary society, and subject matter experts. The second part concedes that after having gained inspiration from the three sources, one may be left with a plethora of objectives that need to be sorted. The two screens by which to sort these objectives are through philosophy and psychology.

As described in the previous chapter, key education leaders such as Dewey, Thorndike, and Hall focused on the purposes of education. Was the purpose of education to enable society to have more democratic citizens? Was it to serve the economy? Was the purpose to help with the development of the child? The purpose of education was the guiding question that led to the various debates and the formation of different educational movements during the Progressive Era. In the *Basic Principles of Curriculum Design*, Tyler departed from the grander notion of purpose in education. In the first sentence he states: "Many educational programs do not have clearly defined purposes" (Tyler, 1949, p. 3) He then describes how often teachers only have a vague understanding of their purpose and this is linked to the lack of educational objectives. Here was a shift in the focus of educational purpose. What was once a philosophical and sociological question in education became an institutional question best answered by the school rather than by discussion in society at large.

Tyler was able to move the understanding of the purpose of education from a societal question to an institutional question because he defined for his audience what education is: "Education is a process of changing the behavior patterns of people" (Tyler, 1949, p. 5). The

introduction of this definition of education created a general understanding of what education is, therefore it allowed him to push the philosophical questions of education into the background. During the Progressive Era, the question of the purpose of education was important because the new educational movements were forming their foundational thoughts and defining the principles in which their ideas were based on. This was necessary to justify and position their existence vis-a-vis traditional schooling. Fifty years later, Tyler removed this notion of principles and replaced it with process.

Moving from a philosophical and societal understanding of the purpose of education to an emphasis on process is key in the development of the objectives-based regime of truth. According to Foucault:

Power must be understood in the first instance as the multiplicity of force relations immanent in the sphere in which they operate and which constitutes their own organization as the process which, through ceaseless struggles and confrontations, transforms, strengthens, or reverses them; as the support which these forces relations find in one another, thus forming a chain or a system (Foucault, 1990, p. 92).

Prior to the Tyler rationale, ideas regarding the purpose of education were being adopted to various degrees. These various degrees of adoption of the different philosophies of education in the school systems and institutions, and by educators is a reflection of the “ceaseless struggles and confrontations” these knowledges had (Foucault, 1990, p. 92). When the Tyler rationale was used by curriculum makers, advisors, or anyone else in education, these knowledges were operationalized in a specific way in relation to objectives-based learning. Therefore, when an educational practice or idea that did not have had its origins in objectives-based learning was coupled with the Tyler rationale, it lost its original sense but gained legitimacy through its association with the Tyler rationale. The Tyler rationale for curriculum design provided an alternative field of power in which these knowledges could operate.

As mentioned above, Tyler argued that the three main sources for educational objectives are learners, contemporary society, and subject specialists, but the objectives that are sourced should be subject to two filters: philosophy and psychology. In this framework of educational purposes, space is allocated for the differing ideas that surfaced during the Progressive Era. For example, Tyler valued the theories of the mental disciplinarians as this related to their role as subject specialists. Tyler acknowledged the influential role they played at the turn of the century - particularly the Committee of Ten - in shaping education. He stated that although these subject specialists received much criticism for their highly specialized and technical influence on the curriculum, the criticisms were perhaps unfair as

the mental disciplinarians were building a curriculum for everybody to become highly specialized and technically knowledgeable. What should have been asked of them instead was: “What can your subject contribute to the layman, the garden variety of citizen?” (Tyler, 1949, p. 26). Tyler believed that the curriculum proposed by the Committee of Ten assumed that each student would eventually become an expert in that subject matter. For example, the committee members for history created a history curriculum for a student that would eventually become a historian.

However, Tyler (1986) supported Thorndike’s transfer of learning theory meaning that Tyler did not believe in the fundamental principle behind the curriculum of mental disciplinarians: studying traditional subjects building the mental capacity of individuals and shaping them into moral and well-reasoned members of society. Since Tyler did not believe in mental discipline, he removes the principles in which these educators’ practices are founded and finds their utility only as subject experts.

Tyler then provided space for the ideas of the child development movement when he placed learners as a source of educational objectives. He consolidated the child development movement into his framework with one phrase: “the primary basis for educational objectives is the interest of the learners themselves...children’s interests must be identified so that they can serve as the focus of educational attention” (Tyler, 1949, p.10). For Tyler, the main purpose of including the learners themselves as part of the curriculum process was to ensure that they are interested in what they are learning so that they become active participants in the learning process. Tyler wrote:

Education is an active process. It involves the active efforts of the learner himself. In general, the learner learns only those things which he does. If the school situations deal with matters of interest to the learner he will actively participate in them and thus learn to deal effectively with these situations (Tyler, 1949, p. 11).

However, Tyler removed any reference to methods of learning in his simplification of the child development movement’s ideas. There was no reference to the cultural epochs that guided the theory of child development led by G. Stanley Hall. There was no mention of Kilpatrick’s Project Method, where the act of learning centered around the child with the child’s interest as one part of the process of learning within this method. Also omitted from Tyler’s interpretation of child development was the aspect of *learning life* itself, that was central to both Kilpatrick and Dewey’s understanding of child development. For Kilpatrick and Dewey, the learning environment of the child was a place in which they could exercise democratic values. Dewey (1897) stated, “I believe that education is a process of living and

not a preparation for future living” (p.78). In other words, education was not a preparation for life, but rather it was already life itself. It seems Tyler’s interpretation of being an active participant in the learning process is closer to Thorndike’s understanding of learning, specifically the law of exercise and repetition. If the student is to learn, then the school needs to provide the environment in which that student can do what is asked of them. In other words, demonstrate their behavior.

The omission of the exercising of democratic values in Tyler’s learner-centered interpretation is replaced by the identification of gaps in the needs of the student. He encouraged schools to investigate the needs of the students, and compare these results with “some desirable standards, some conception of acceptable norms” (Tyler, 1949, p.6). When a gap between the needs of students and the norm is identified, this is where energy in learning should be placed. A gap can also be found when the interests of the students are undesirable:

Where these interests are desirable ones they provide the starting point for effective instruction. Where the interests are undesirable, narrow, limited or inadequate, they indicate gaps which need to be overcome if the student is to receive an effective education” (Tyler, 1949, p.10).

Tyler encouraged his students to look at the “technical literature in the curriculum field [which] includes hundreds of studies that collected information useful to curriculum groups” (p.5) as comparison to determine which objectives are suitable. Although Tyler placed emphasis on the importance of the interests of the child, it seems that those interests were only important if they were aligned with the predetermined learning outcomes the curriculum defined.

Tyler acknowledged that varying ideas in education were often pitted against each other. He cautioned that “no single source of information is adequate to provide a basis for wise and comprehensive decisions about the objectives of the school” (Tyler, 1949, p.5). He stated that each source of information “has certain values to commend it” and so “should be given some consideration” (Tyler, 1949, p. 5). This perceived neutrality allows the different educational knowledges developed during the Progressive Era to be interpreted through a Tylerian lens. For example, regarding educational philosophy, no longer was it up to different educational movements to determine what philosophical underpinning American education should be founded upon. Rather, it was the school that should determine what their own educational philosophy should be. The educational philosophy of the school should “attempt to define the nature of a good life and a good society” (Tyler, 1949, p. 34). The school philosophy will also likely address “material values and success” (Tyler, 1949, p. 35).

Tyler went on to outline other questions the school philosophy should address:

Should the educated man adjust to society, should he accept the social order as it is, or should he attempt to improve the society in which he lives? [...] Should there be a different education for different classes of society? [...] Should public education be aimed primarily at the general education of the citizen, or should it be aimed at specific vocational preparation? [...] Is democracy to be defined solely in political terms, or does democracy imply way of life at home, in the school, and in economic matters, as well as a form of political life (Tyler, 1949, pp. 34-37).

It seems that Tyler believed that each school should have the liberty to identify desired changes of behavior to be brought about through learning. Schools should turn to learners, contemporary society, and subject matter experts for inspiration in defining learning objectives. Steffes (2012) writes that the level of autonomy that a school had in making philosophical decisions based on what was best for the community that they serve, can be thought of as a democratic value (Steffes, 2012). However, outside of urban districts, states were unable to gain much control over school districts because of the distrust local people had for a centralized governance regarding education. Steffes writes:

Centralized control undermined participation in schooling by the people and thus threatened not only to diminish local autonomy and self-government but also to undermine the democratic values it fostered in the individual, including personal and social responsibility (Steffes, 2012, p. 85).

The inability to create an administrative educational hierarchy in rural schools may be why Tyler called for the community of educators of the school to be involved in creating the objectives, choosing the learning experiences, organizing the learning experiences, and designing effective evaluations. However, this autonomy was undercut by the need to have a curriculum expert to guide the community of educators in creating these objectives.

Tyler's text, *Basic Principles of Curriculum and Instruction*, is an important tool in the regime of truth that surrounds objectives-based learning. According to Foucault:

Each society has its regime of truth, its 'general politics' of truth: that is, the types of discourse which it accepts and makes function as true; the mechanisms and instances which enable one to distinguish true and false statements, the means by which each is sanctioned; the techniques and procedures accorded value in the acquisition of truth; the status of those who are charged with saying what counts as true. In societies like ours, the 'political economy' of truth is characterized by five important traits. 'Truth' is centered on the form of scientific discourse and the institutions which produce it (Foucault, 1980, pp. 131-132).

In *Basic Principles*, Tyler outlined the type of science that should be used in education to decide how a school should function. To apply the Tyler rationale in a school setting, the school automatically becomes bounded within the science of one form of educational psychology - the theories of learning developed in behaviorist psychology and its associated instruments of measurement.

Tyler used psychology as part of his encouragement to the reader to use contemporary life outside of school as an element in creating learning objectives. Firstly, he justified the need for using contemporary life by citing Thorndike's transfer of learning theory:

As long as educators believed that it was possible for a student to train his mind and the various faculties of the mind in general and that he could use these faculties under whatever conditions might be appropriate, there was less need for analyzing contemporary society. [...] Studies of transfer of training, however, indicated that the student was much more likely to apply his learning when he recognized the similarity between the situations encountered in life and the situations in which the learning took place (Tyler, 1949, p. 18)

He asked his students to use psychological forms of measurement so that "the probability is increased that judgements about objectives will be wise and that the school goals will have greater significance and greater validity" (Tyler, 1949, p. 4). They could start collecting and analyzing data for themselves or they could start with their memories and personal experiences. They should then extend the data collection to the wider community. They could also consider public opinion polls over the last few years, and even research government data. The curriculum expert should be, "taking at least six types of data, attempt to infer educational objectives and see what problems are involved in doing so" (Tyler, 1949, p. 23). Tyler warned that in obtaining data from student experience, multiple interpretations can be made. The way to obtain objectivity from these multiple interpretations is to obtain more data. The need to use science to create a curriculum renders illegitimate any teacher or other educators untrained in scientific curriculum.

Asking teachers to observe and collect data from their immediate experience, and to compare that data with community, state, and national studies undercuts the teachers' autonomy and potentially may have rendered them to feel incapable of designing a curriculum. Firstly, if the teacher felt that any problems needed to be addressed within their community through the schools, these problems could be deemed invalid in comparison to state or national studies. The comparison of the teacher or school principal instinct with state or national studies could make them to not only trust their knowledge less, but to normalize

their practice to that of the state or national standards. The act of comparing to state or national standards can render any community “truths” as “false.”

Secondly, the difficulty for an ordinary teacher to obtain and analyze the data Tyler suggests seems obvious. The average teacher at the time did not have the same access to resources as the students Tyler taught in his course. He encouraged the users of his rationale to look at the research “already available to throw a good deal of light upon the possible objectives in the field of national and international affairs, data indicating critical social, political and economic problems. There are also data in the general areas relating to music, the arts, and aesthetic life” (Tyler, 1949, p. 23). This is knowledge that may not have been accessible to the teachers or other educators working in the common school. Even in today’s modern world with internet, and studies made available online, it would still be a daunting task for an average educator to gather the data that Tyler suggests. Were libraries or town halls in the early 1950s so equipped that they housed such documents for an educator to access? Furthermore, should an educator have been able to gather this data, that would mean that they would have also needed the time to not only analyze, and interpret the data – which is just the first step of the first stage of what became known as the *Tyler Rationale*.

Every time a practitioner used the Tyler Rationale, it cemented their place as the curriculum expert in the educational field and further legitimize the scientific process of the Tyler Rationale. This is how the multiplicity of force works and continues to grow in present day further contributing to this regime of truth. It is in the actions of individuals that activates power. This is why the Tyler Rationale is so important in this regime of truth. Tyler took knowledge and put it into an actionable process. Actionable by experts in the educational administrative hierarchy. When these experts succeeded in convincing schools and the educators and staff in these schools to apply the Tyler Rationale, they too became agents to this regime of truth.

Another important element in Tyler’s work is the emphasis he placed on evaluations. He wrote:

Since educational objectives are essentially changes in human beings, that is the objectives aimed at are to produce certain desirable changes in the behavior patterns of the student, then evaluation is the process for determining the degree to which these changes in behavior are actually taking place (Tyler, 1949, p. 106).

What Tyler described points to a circular reasoning in educational practice: create objectives with observable behavior and create an evaluation that can measure that behavior. Contrary to the scientific method in which a hypothesis is made and is tested for validity, anything that does not fall within the circular reasoning of objective measured against a behavioral evaluation is discounted. Prior to Tyler, the validity of an exam was tested against a normal

distribution curve. If a test failed to allocate students along this distribution, then the test was not valid. Tyler shifts the validity of the process to the individual student – to what extent is the student able to achieve an objective. For him, the evaluations serve as the tool to see if the students' behavior have been adjusted adequately to have reach the learning objectives defined.

This shift in the approach to evaluation is where Tyler discounted other ways in which learning that can happen. For instance, Dewey believed in the use of the scientific approach in curriculum design (Rosenthal, 1981). Rather than defining learning outcomes, he believed that teachers should start with a hypothesis what students should learn, create experiments or activities for students to test the hypothesis, and then analyze the different ways and things that students learned from the activities that they engaged in. From that, a teacher would then create a new hypothesis, or “turning point” to move instruction forward (Kliebard, 1970). Dewey believed that multiple types of learning could happen from any given situation. Tyler's circular reasoning departed from this scientific approach.

In at least two instances, Tyler acknowledged that a multiplicity of learning can occur in each situation. When describing the psychology of learning, he states, “One of the most important psychological findings for the curriculum maker is the discovery that most learning experiences produce multiple outcomes” (Tyler, 1949, p. 40). He also mentions this multiplicity as one of the five main principles in creating learning experiences. He states, “A fifth principle is that the same learning experiences will usually bring about several outcomes” (Tyler, 1949, p. 67). However, unlike Dewey who believed that the discovery of learning as it happens is part of curriculum design, Tyler believed that all the multiplicities of learning must be thought of in advance by the educator. Not only should the educator think of the multiplicities of learning that can arise from the activities beforehand, but in thinking about these multiplicities of learning, and educator can create a more efficient curriculum because multiple educational objectives could be addressed in a single activity. He does concede that an activity could produce negative outcomes, which means, “the teacher must always be on the lookout for undesirable outcomes that may develop from a learning experience planned for some other purpose” (Tyler, 1949, p. 68).

What is curious in Tyler's reasoning is that he acknowledges that unplanned outcomes could arise. However, these unplanned outcomes are unusable. Any positive unplanned outcomes that arise are attributed to lack of anticipation on the teacher's part. All positive outcomes should have been thought about beforehand by the educator - but not every learning outcome can be conceived of ahead of time. And it is precisely these unplanned positive outcomes that Tyler has discounted as learning in his rationale. When an unplanned positive outcome occurs, it cannot be used in the Tyler Rationale, because it

wasn't planned for. This seems to be because Tyler is looking to organize learning into a linear master plan. Arguably, this "underlying assumption that children should move at a certain rate through a 'normal' agenda of academic exercises" comes from Thorndike's influence (Levin, 1991, p. 74).

The learning inherent in the discipline itself that was promoted by the mental disciplinarians is discredited from Tyler's work because there is no set time as to when learning should be achieved. Learning happens organically as students engage with the discipline. Kilpatrick's child-centered project-based curriculum would also be an inadequate form of curriculum design within Tyler's framework because of its open-ended nature. This delegitimization of other curriculum thought is achieved through the process of making a direct link between the objective and the assessment.

Conclusion

Tyler's *Basic Principles of Curriculum and Instruction* is an important tool in the regime of truth of outcomes-based learning. First, it depoliticized the educational movements that began in the Progressive Era, by removing the ideologies and principles that the earlier movements came from. This enabled users of the Tyler Rationale to overlap and bring together conflicting ideas under the guise of a scientific approach to curriculum design. Secondly, as this scientific approach was taken up by educational consultants, curricularists, superintendents, and other members of the administrative educational hierarchy, which further legitimized their own existence and positions within the school system. They became the experts who used scientific knowledge to help construct the school curriculum. Finally, Tyler laid down the foundation for three aspects that must be included in a curriculum: objectives, change in behavior, and evaluation. These three aspects provided a common language and practice that was easily articulated, understood, and identified yet, still necessitated the intervention of an expert to implement correctly.

Following from the work of Tyler, I will next look at the influence of Hilda Taba. The "Taba Curriculum" shares the following commonalities with the Tyler approach and with backward design: the development of a procedural process for curriculum design; governmental influence either through state or federal reforms using their approaches; and their basis in a performative approach to learning.

Chapter 5: Hilda Taba

Introduction

The “Taba Curriculum” is often mentioned in relation to both the Tyler Rationale and backward design (Cho & Trent, 2005; Kelting-Gibson, 2005; Hockett, 2009; Richards, 2013; Dack, 2019; Trowsdale, 2023). In her explanation of curriculum development, Taba attempted to isolate the mental process of learning from the integral study of traditional disciplines. In shifting the focus from content to mental processes, Taba called for specific choices to be made in curriculum development which are also present in backward design. For example, Taba promoted the “sampling” of content and felt that the most valid content relies on “how fundamental the knowledge is” (Taba, 1962, p. 269). Backward design reasons in a similar manner, but calls it filtering content through “enduring understandings” (Wiggins & McTighe, 1998, p. 23).

Another element of similarity is in Taba’s idea of a “spiral curriculum” whereby, “a curriculum [...] alternates intuitive and analytic thinking, experience and verbal learning” (Taba, 1962, p. 156). Taba supported the spiral curriculum through a process of questioning “to lift thought” (Taba, 1965). For backward design this is truncated to a process called “a cycle of questions-answers-questions” which is described as “the key to understanding by design” as it causes “rethinking through the appropriate inquiry and performance” (Wiggins & McTighe, 1998, p. 33). There are other elements in the process of curriculum development that are similar between Taba and backward design, but the purpose of this chapter is not to trace the point-by-point similarities between the two. This is after all a genealogy, and a genealogy assumes that “words” do not “keep their meaning,” “desires” do not “point in a single direction and that ideas” do not “retain their logic” (Foucault, 1977, p. 139). As Foucault wrote about ideas, a “genealogy must be sensitive to their recurrences, not in order to trace the gradual curve of their evolution, but to isolate the different scenes where they engaged in different roles” (Foucault, 1977, p. 140).

This chapter serves to historicize Taba and her seminal work *Curriculum Development Theory and Practice* (1962). In this chapter, I will discuss how Taba navigated her ideas in curriculum theory against the growing criticism towards ‘educationalists’ because of the life adjustments movement. This will be done through the continued tracing of the “reciprocal incompatibility” between traditional education and progressive education. I will show how Taba positioned herself not only against traditional education, but also against behaviorist theory. As I examine how Taba navigated her ideas, I will point out some tensions in her theory and call into question charges that were held against traditional

schooling. Doing so will highlight the varied “strategic possibilities that permit the activation of incompatible themes, or again, the establishment of the same theme in different groups of statement” (Foucault, 2010, p. 37). Although her theory may not always be structurally sound, the activation of incompatible themes or her justification of a particular theme from behaviorist theory in a different manner, was necessary for her theory to “survive.”

The critical questions that guided this chapter were as follows: *Who was Hilda Taba? How did the shifting tides of educational discourse impact the development of Taba’s curriculum theory? How were educational practices based on contested theory able to maintain its prevalence? How does Taba’s contribution to curriculum theory reinforce the conduct of conduct for Backwards Design?*

Hilda Taba

Taba was born in Estonia on December 7, 1902. After high school, in 1921, she began teaching in an elementary school. She later obtained her bachelor’s degree from the University of Tartu in 1926 where her initial studies in pedagogy were influenced by German didactics and education philosophy (Krull, 2003). She completed a master’s degree from Bryn Mawr where she took a strong interest in progressive education and the work of John Dewey (Laanemets & Kalamees-Ruubel, 2013). She then applied to Teacher’s College (Columbia University) to pursue a doctoral degree in 1927 which was supervised by William H. Kilpatrick. At Teacher’s College, she interacted with other prominent figures in education such as John Dewey (Isham, 1982; Costa & Loveall, 2002; Krull, 2003) and Edward Thorndike (Isham, 1982; Westgaard, 1990). In 1933, she was recruited to work on the Eight-Year study alongside Ralph W. Tyler. Impressed with her knowledge of curriculum theory and process, Taba joined Tyler’s evaluation team and became co-coordinator of the social studies curriculum (Isham, 1982; Krull 2003). It has been put forward that during this time both Taba and Tyler influenced each other in their respective formulation of the curriculum design process (Laanemets & Kalamees-Ruubel, 2013).

Taba’s curriculum process is similar to Tyler’s. Taba outlined eight elements: (1) diagnosing needs; (2) formulating specific objectives; (3) selecting content; (4) organizing content; (5 & 6) selecting and organizing learning experiences; (7) evaluating; (8) checking for balance and sequence. As a reminder, Tyler’s process outlined these guiding questions: (1) What educational purposes should the school seek to attain? (2) How can learning experiences be selected which are likely to be useful in attaining these objectives? (3) How

can learning experiences be organized for effective instruction? (4) How can the effectiveness of learning experiences be evaluated? (5) How might a school or college staff may on curriculum building?

Laanemets and Kalamees-Ruubel (2013) argue that one main difference between Tyler and Taba is the former uses a deductive process (structuring the curriculum content from general to specific) whilst the latter uses an inductive process (leading the students from specific ideas to generalities). Another difference often cited between Taba and Tyler is that Taba's approach places teacher involvement as a central aspect to curriculum design (Olivia, 2005; Ornstein & Hunkins, 2009; Laanemets & Kalamees-Ruubel, 2013, Portillo, et al., 2020).

After working with Tyler, Taba went on to lead two major projects in curriculum design: the Intergroup Education in Co-operation Schools project that started in New York City in 1945 which evolved into the Center for Intergroup Education in the University of Chicago and the Taba Curriculum Development Project in Social Studies in the San Francisco State College in collaboration with Contra Costa County Department of Education in California from 1951-1967 which was sponsored by the U.S. Department of Education. The latter will be discussed in the final section of this chapter.

Amid the race riots of 1944, the Intergroup Education project was developed to explore educational ways to improve intergroup and human relations (Isham, 1982). The curriculum focused on four key aspects to help unpack the construction of stereotypes and prejudices (1) differences in the style of family, (2) differences in the lifestyles of the communities, (3) ignorance of American culture, and (4) development of peaceful relations between individuals (Krull, 2003). Sevier states that the goal was to infuse this curriculum throughout the K to 12 classrooms via:

the Project's central staff, which included over 100 academics, teachers, and school administrators [who] coordinated field visits to public schools and school districts, managed in-service training and summer workshops, and published numerous documents on intergroup education (Sevier, 2008, p. 126).

Taba believed intergroup education should be a central focused not only for the social studies curriculum, but throughout the school curriculum:

Intergroup relations are coterminous with total education; changed emphases and materials in the curriculum as a whole are to be expected as concern over intergroup relations rises. Some new topics or units may well be inserted in courses in the social studies, the humanities, and biology. [...] Defining the curriculum as the total set of experiences into which schools

direct pupils, the actual way of living in schools as miniature societies has great pertinence for education in group living (Taba & Wilson, 1946, p. 19)

Taba's work on in the intergroup project exposed her to cultural differences faced by minorities and immigrants, which shaped her thinking regarding curriculum design. Culture and its integration in the curriculum is a prominent agenda she has throughout her career.

Historical Context: The shifting tides in educational discourse

When Taba started working for the Intergroup Project, the educational climate was ripe for integrating socialization into the school curriculum. This was due in part to the Prosser Resolution. In 1945, during the national convention of American Vocational Association in New York, Charles A. Prosser gave a speech that would be the impetus for the life adjustment curriculum movement (Franzen, 1951; Ravitch, 2000; Kliebard, 2004; Paraskeva 2011). Prosser proclaimed that twenty percent would be prepared through vocational schooling, whilst the high school prepared another twenty percent for college, leaving sixty percent of the youth population without the appropriate life adjustment training needed to thrive in American society (Kliebard, 2004). To better address the needs of the sixty percent, there was a shift in American curriculum that focused more on socialization rather than academics.

Following World War II, Taba's field of social studies saw an explosion of curriculum guides as the life adjustment movement grew (Fallace, 2011). The social studies curriculum became a natural vehicle to socialize students to be members of society. Fallace writes:

Once the curriculum was freed from the restraints of academic knowledge, many perceived social deficiencies, such as personality adjustment and family living, became the focus of curriculum content. In many instances, social studies teachers coordinated their efforts with guidance counselors, who administered personality and ability tests to students. In some cases, history teachers were the guidance counselors. Issues of how to make and maintain friends became the substance of social studies instruction, not just a topic for the hallway or guidance office. As a result, history content was aimed towards addressing personal, but not necessarily intellectual, deficiencies (Fallace, 2011, p. 580).

The life adjustments curriculum tended to focus on students learning knowledge and skills that were applicable to their daily lives. This attempt at adjusting curriculum to meet the individual needs of the student through the administration of personality and ability tests, whilst at the same time narrowing the content to the curriculum to only meet the immediate

issues that the students encounter in their lives, points to a Thorndikean conception of learning. Continued adoption to this Thorndikean perspective could be attributed to the growing diversity that was populating the public school system.

The passing of *Brown vs Board of Education* (1954) and an increase in federal intervention towards broadening educational access with the passage of the GI Bill of 1944, and The National Defense Education Act of 1958, (Walton, 2009) contributed to the struggle of providing education that met the needs of the new populations that wanted an education. The life adjustments movement seemed to provide the appropriate curriculum for these growing populations. However, while some saw life adjustments to be the answer to this phenomena, others, specifically academic traditionalists saw life adjustments as the start of the intellectual decline of American society (Wraga, 2010).

A vocal and notable critic to the influence of life adjustment in the American curriculum was historian and professor Arthur Bestor (Kliebard, 1995; Reese, 2005; Urban & Wagoner, 2013). He criticized the declining standards of American education due to the influence of life adjustments arguing that the schools have lost their essential focus which was intellectual training. Bestor wrote: “It is not the job of the school to meet the common and specific individual needs of youth, if it were, then the school should undertake to meet needs even more basic[...]” such as food, clothing, and shelter (Bestor, 1952, p. 415).

Bestor challenged the shifting responsibilities of the school towards socializing youth. He argued that schools should not be expected to shoulder the problems of society. Rather these problems should be redistributed across all social agencies:

The school is one, but only one, of the agencies of society ministering the needs of young men and women. The family, the church, the medical profession, the government, the agencies of social welfare, the industrial corporations, the private businessmen all have something to do with meeting the needs of citizens, young and old. The fact that other agencies may not be doing their jobs as well as, or in the manner that one would like is no reason for the school to neglect its own tasks, too, in an attempt to remedy the deficiency (Bestor, 1952, p. 416).

The school should revert to its function of educating: specifically, educating through the use of traditional subjects so that sound intellectual training can be assured. Bestor stated that an “indispensable function” of education “at every level” was to provide

sound training in the fundamental ways of thinking represented by history, science, mathematics, literature, language, art, and other disciplines evolved in the course of mankind’s long quest for usable knowledge, cultural understanding, and intellectual power (Bestor, 1956, p.7).

As an educational traditionalist, Bestor believed that education was fundamental in upholding democracy in American society. Firstly, it educated the population so that they could be critical participants in society (Bestor, 1956). Secondly, for Bestor, (1956) access to traditional education was a question of justice. Every citizen should have the right to the high educational standards that the traditional curriculum provides.

Perhaps the most challenging event for the life adjustments movement was the Soviet Union's launch of Sputnik on October 4, 1957. Sputnik's launch signalled that science and creativity could thrive in a communist state. This challenged the merits of Western democracy, and the American education system was blamed for this failure by the American people (Read, 1960). Moreover, the technological leap made obvious with the launch of Sputnik instilled fear in the ability of the United States to defend itself against a potential communist attack (Kay, 2009). Two major shifts in educational policy were a direct reaction to Sputnik. Firstly, increased federal intervention through funding and a legislative framework focused on technical rationality, oversight, competitiveness, and widespread school reform. Secondly, close association between the failures of education and weaknesses in national security (Steeves, Bernhardt, Burns, & Lombard, 2009).

Although the extent to which life adjustments permeated the school curriculum is arguable according to Wraga (2010) what was most damaging was the effect that the life adjustments movement had on educators. Katz writes:

The utter failure and humiliation associated with the life adjustment curriculum savaged the reputation of the educationists (and indeed, the discipline itself) in the eyes of their skeptical colleagues on campus and the American public. Herein the term 'educationist' achieved its pejorative apogee associated with those whose practiced the pseudo-science of education (Katz, 2007, n.p.).

It was in this post-sputnik, anti-educationalist backdrop that Hilda Taba published *Curriculum Development Theory and Practice* and described the crisis in public education (1962, p. 2):

The schools are criticized for their softness, anti-intellectualism, progressivism, egalitarianism, lack of emphasis on fundamentals and academic skills, and a misplaced emphasis on life adjustment and emotional development.

While Thorndike and Tyler were on the offensive with their critiques against traditional schooling, Taba was in a more defensive position towards traditional education. Taba's work in Intergroup Education led her to believe in the necessity of considering social needs in the curriculum, an approach that ran counter to the life adjustments approach. What seems to allow Taba to defend herself against the attacks on life adjustments and work to delegitimize traditional schooling is her integration of culture into curriculum design. She notes that the democratization of education in the United States has led to an increase in school attendance from "the bottom of the pile" population, who Taba believed were less motivated and able to cope with the school culture and environment (Taba, 1964, p. 147). She also noted that migration from rural areas to urban cities contributed to the cultural challenges in education. In this scenario, not only were family values less supported by the external environment, but also the tiny enclaves in which these migrants lived prevented them from learning from the larger culture in which they existed (Taba, 1964).

The Taba Curriculum: Finding new avenues of legitimacy

Curriculum Development Theory and Practice is divided into four parts: (1) the foundations for curriculum development; (2) the process of curriculum planning; (3) the design of the curriculum; (4) the strategy of curriculum change. It is in the first section where Taba positions her perspective on curriculum design, devoting nearly two-fifths of the book to justify her positioning. In this section, we obtain a greater sense of the eclecticism of knowledge and influence that Taba draws from.

She started *The Foundations for Curriculum Development* by praising the work in education during the progressive era:

Education at that moment was ready for a rationally planned diversity, a scientifically calculated way of meeting and dealing with heterogeneity of individual talents and social backgrounds. It was ready to develop ways and means of measuring intangible learnings, such as the power to think and to create, and by doing this, to rescue these important educational outcomes from the status of concomitants to the main business of mastering facts and academic skills (Taba, 1962, p. 4).

Krull (2003) suggests the main influence on Taba's thought regarding curriculum was John Dewey. However, in analyzing this text, there is a rationalist undertone to her interpretation of the gains and merits that curriculum design had achieved. She uses the phrases "rationally planned diversity", "scientifically calculated way of meeting and dealing with heterogeneity," "measuring intangible learnings" and "educational outcomes." Her language

is telling as it is derived from the ideas of the social efficiency movement: the impact of Tyler on her thinking can be seen. However, phrases such as “the power to think and create” and “rescue [...] from [...] the main business of mastering facts and academic skills” is where we can see more nuanced thinking about learning and curriculum than is seen in Thorndike’s approach (or, arguably, in the Tyler model). It is also interesting to note how Taba painted the ideas from the progressive era as a unified block to give credence to her disregard for traditional schooling.

Taba believed that following World War II, progressive ideas in education had halted and “into this vacuum have stepped proposals for reforms, many of which are animated by the prescientific conception of the discipline of mind and betray ignorance of principles of learning or lack a familiarity with the nature of school population and social realities” (Taba, 1962, p. 5). Here Taba challenged two main points regarding traditional curriculum: its relevance to society and its relevance to learning.

Challenging relevance to society

Following Sputnik, preparation for a more technological society was emphasized and curriculum reforms focused on technical rationality. However, Taba questioned the ability of traditional schooling to adequately respond to the needs of a technological society and the problems that might arise in a rapidly changing society. She wrote:

Some educators take a simple view of the needs arising from a technological society and combine this view with the traditional concept of education. [...] [T]hey believe that a technological society simply requires technically prepared people [...], therefore, the task of schools is to increase and to improve the training in mathematics and in science of everyone and to see that talent is directed into special study of these areas (Taba, 1962, p. 40).

She found this problematic because this reasoning would not lead to an education that could prepare a person adequately for complex realities. She believed that the traditional academic curriculum created specialists who did not understand their part within the whole system.

Taba believed that technological advancements did not necessarily equate to social progress and could even bring about more problems. This was why for her there was a need

for creating an integral orientation towards the whole society and the whole man. Scientific and technological reasoning tends to be so compartmentalized that specialists can talk only to each other (Taba, 1962, p. 41).

Moreover, she believed that the way the traditional curriculum was structured further prevented students from understanding how knowledge relates to one another.

This integrated world view cannot come about when education consists of “disordered” knowledge in which one aspect bears no relationship to another and of training composed of a bewildering array of credits, courses and requirements (Taba, 1962, p. 42).

It seems that she insisted on the compartmentalized nature of traditional schooling, both in the study of the disciplines and in the execution of the curriculum, to highlight the traditional curriculum’s inability to enable students to generalize and transfer mental processes from one circumstance to another. This then opened an avenue to position her theory of curriculum development. However, it is strange to have a curriculum that is both “disordered” in its knowledge, while at the same time being capable of training specialists in science and technology.

She further challenged the traditional curriculum by calling into question the cultural heritage that it transmitted. She claimed that the rationale behind the subjects chosen to be part of the traditional curriculum was embedded in the “ancient truths” that the subjects were supposed to hold. However, Taba wrote that these “‘ancient truths’ are not always applicable to the realities and the needs of modern society except in a sense so general as to be unachievable short of a lifetime of study” (Taba, 1962, p. 22). She even went as far to say that the continued study of these subjects could be dangerous for society and that, “society today needs to create its own image of the true, the beautiful, and the just” (Taba, 1962, p. 22). Continued use of these ‘ancient truths’ could limit possibilities for this liberation because any thought will be tied to these ‘truths.’ Taba argues that what was required was:

a re-examination of ways of using past wisdom and of the assumption that it is necessary to steep minds in a background of cultural heritage without which it is impossible to think about the foreground. [...] [T]o what extent will such steeping in the past heritage blind and condition the understanding of the new by binding the mind to concepts and thought forms that no longer apply? (Taba, 1962, p. 42)

Alongside these ancient truths, she also challenged the democratic values that the traditional curriculum purports to impart.

Democratic values were a pillar of the traditional curriculum and education during the progressive era (as illustrated in Chapter 3 when discussing Charles Eliot during the Progressive Era, and in the previous section of the current chapter when discussing Arthur Bestor). Taba, however, felt that traditional education fell short of living up to its democratic values:

The basic values on which democracy rests are either taken for granted or at best treated with sentimental deference, instead of being treated critically and considered seriously as an important basis to the whole theory and practice of education in a democratic culture (Taba, 1962, p. 45).

Interestingly, Taba also argued that an affront to democratic values in education was also due to the strong emphasis in science and scientific method, which led to a value-neutral perspective of the world that may neglect other “cultural realities or [...] beliefs and values” (Taba, 1962, p. 44). This charge was aimed less towards the traditionalist, and more towards Thorndikean behaviorists and their “deterministic assumptions” of people and their places in society (Taba, 1962, p. 44). Taba opened her charge against traditional schooling but juxtaposing it against the work established during the progressive era. She presented this work as if it was a unified block, and it gave credence to her criticism against traditional schooling. However, as she detangled herself from a main educational thread that emerged from the progressive era, behaviorist theory, it problematizes the irrelevance of the traditional education that Taba vehemently contends.

Challenging concepts of learning

Using the language of her time, Taba stated that learning theories are derived from two concepts of “man”. Firstly, man as having certain inherent capacities and secondly man as an energy source who reacts and interacts with the energy system around him. She wrote:

The first concept of man produced the first theory of learning often referred to as the theory of mental discipline or faculty psychology. The central idea of this theory is that the mind inherently contains all the attributes, or faculties, and that the task of education is to bring them forth by the exercise of acquiring knowledge (Taba, 1962, p. 79).

Even though Taba was rather dismissive of this concept of learning, she acknowledged its continued pervasiveness in teaching and curriculum selection:

This idea of learning, now displaced as a psychological theory, would be only a historical curiosity except for the fact that it is by no means yet discarded. Much of teaching and curriculum selection in high school suggest this criterion at work. Many current critics of educational practices seem to make similar assumptions when they advocate toughness and hardness of study per se (Taba, 1962, p. 80).

The second concept of learning is derived from the belief that man is constructed by the environment around him. According to Taba, behaviorist theories belonged to this concept, but behaviourist ideas of learning were limited because the stimulus-response mechanism of learning was far too simplistic. She wrote that:

The exclusive emphasis on the development of intellectual powers advocated by many today reflects a disregard of the organic wholeness of the learning and of the learning act established by current psychological research. Many practices such as teaching skills out of context and rote drill, hark back to the S-R theory of learning (Taba, 1962, p. 80).

In this form of learning it was believed that transfer could only happen when the environments were identical.

Taba cited the works of Thorndike and Woodworth (1901), Thorndike (1906), and Wesman (1945). She acknowledged their attempts to prove that the theory of transfer of learning (in the vein of mental disciplinarians) was incorrect. However, Taba did not agree with their findings:

While these experiments and the conclusions from them were rigorously scientific, they were conducted under conditions in which cognitive processes had no place and which therefore prevented any findings on transfer through cognitive means. The majority of investigations proving the absence of general transfer were guided by a mechanistic conception of mind, behavior, and learning (Taba, 1962, p. 123).

Taba stated that these findings greatly influenced education shifting “attention away from producing general understanding to teaching specific knowledge and skills” and “lent sanction to the introduction of practical subjects in which knowledge and skills were offered as near to the context in which they would be used” (Taba, 1962, p. 123). Taba argues that this theory is what led to “life adjustment” programs. This shift freed the American

curriculum from “the rigid aridity of the classical curriculum” introducing a “more functional education, [...] there were also drawbacks” (Taba, 1962, p. 123). However, the life adjustment curriculum formed a narrow training approach leaving little or no room for abstract thought (Taba, 1962).

This is a very important charge against behaviorist theory, because Thorndike’s transfer of learning theory is one of the foundational attacks against traditional schooling that opened up the field to new forms of curriculum thought (Tyler, 1986). If Taba is correct in her assertion that Thorndike’s findings were questionable, then studies on the transferability of mental processes developed through traditional schooling should have been studied more positively rather than making assumptions that it created “compartmentalized specialist” through its “disordered knowledge.” However, rather than acknowledging the transferability of knowledge proclaimed by mental disciplinarians, she addressed the limitations of behaviorists and finds a ‘solution’ to its limitations through ‘newer theories of learning’ (Taba, 1962, p.164). She argued that “transfer occurs not only by means of specific identical elements, but through generalization either of the content or of the methods employed in learning the content” (Taba, 1962, p. 124). She further stated: “this idea of transfer of learning is now supported by the newer theories of learning, which stress the cognitive nature of learning and assumes all learning is a meaningful organization of experience and response” (Taba, 1962, p. 124)

These new theories of learning come from field theory based on ideas of the social and individual learning, continuity of learning, motivation and transfer of learning. However, Taba writes that learning in field theory is a “vastly complex concept...so complex, in fact, that it is difficult to describe it accurately” (Taba, 1962, p.81). Taba devoted chapter ten to dimensions of social and cultural learning to help the reader understand. She prefaced the chapter by stating that conventional theories of learning are often based on the psychology of the individual. She stated that the “behavioristic concept of learning [...] is the product of laboratory experiments bearing little resemblance to the classroom learning situation, which is more complex and [...] occurs in a social setting and is influenced by that setting” (Taba, 1962, p. 130). She defends the need for social learning by outlining some of the important social-class differences that can affect learning: (1) gratification of immediate needs; (2) control of feelings; (3) cleanliness, punctuality, and orderliness; (4) authority, control, and punishment; (5) motivation, aspirations, and achievement; (6) cues and meanings (Taba, 1962, pp. 135-145).

Here we can see the Foucaultian idea of the “same theme in different groups of statements” over time (2010, p. 37). Taba and Thorndike similarly believed in the inability of most students to extrapolate learning from the traditional curriculum. Thorndike believed

it was due to students' inherent lack of intelligence. Taba believed that it was due to a cultural deficit that some students had (Taba, 1964). Because of this cultural deficit, Taba felt it was more valuable to train the mind in certain mental processes, rather than allowing students with these cultural deficits to work through the subject content in the traditional curriculum. Taba thought that "the most valuable contribution of a field of study lies in generating certain disciplined methods of forming questions, developing logical ways of relating ideas, and following a rational method of inquiry" (Taba, 1962, p. 179). However, unlike traditionalists who believed that this mental discipline is achieved through the study of the discipline in its "integral form," Taba believed it could be achieved by separating out the "intellectual operations" found in a discipline, and sampling the content of a discipline to operationalize thinking. She wrote that a curriculum "organized around selected basic ideas" offered the "possibility of mastering the special methods of thought and inquiry inherent in the various disciplines without spending enormous amounts of time in mastering the entire subject" (Taba, 1962, p. 179).

Taba seemed to allude that the traditional curriculum did not address the mental processes of learning directly. Developing mental processes were not foregrounded in the traditional curriculum, but rather the content was foregrounded. Taba proposed to bring these mental processes to the foreground, and "sample" content rather than "cover" content to activate the use of these mental processes (Taba, 1962, p. 270). Should this process be reversed, Taba argued that it would improve learning:

It is conceivable that with an intensive study of landmark ideas, combined with an articulated emphasis on intellectual operations as the minimum essential for general education in the elementary and high school, a much smaller coverage of facts will produce a vastly greater orientation toward the world, a vastly superior intellectual equipment, and vastly improved skill in using ideas to produce other ideas (Taba, 1962, p. 179).

Regarding how to choose curriculum content, she posited "perhaps the more important question about validity of content is how fundamental the knowledge is" and that "the more fundamental the idea, the greater will be its breadth of application" (Taba, 1962, p. 269). Taba did not provide a clear example of how to identify and select what "fundamental knowledge" is in a subject but did acknowledge that it takes an expert to select and identify this. This creates tension in her theory since a discipline specialist is needed to create her curriculum, yet she condemned traditional schooling because they create specialists. Furthermore, she called for these specialists to identify and select "fundamental knowledge" yet believes that the 'ancient truths' found in disciplines may be harmful to teach.

Was there a real need to reinvent the way learning was derived from traditional curriculum or are there other reasons for this tension? One reason for the perceived need may be linked to the discrediting of ‘educationalists’ and their place in the University. Arthur Bestor believed that teacher education in the undergraduate level should focus on liberal arts and science education rather than in the department of education. The department of education’s role in teacher education should be supportive rather than primary:

The end result will be a small undergraduate department of pedagogy, offering a few courses in the general principles of pedagogy, supervising practice teaching, and perhaps offering an enlarged extension program of on-the-job training for inexperienced teachers (Bestor, 1956, p.250).

If curriculum theorist like Taba, aligned themselves and their strategies of teaching within the traditional curriculum, their relevance and impact would be dimmed. If the theoretical field of education that Taba was working, were to link itself to the already developed power structure of the various departments where these disciplines resided in the university, the field of education could risk being seen as only a supporting role these university departments rather than at the forefront of research. As Bestor implied, educationalists were already overreaching their purpose and they should stick to only improving instruction:

In particular, specialists in pedagogy have no expertness entitling them to decide what weight and attention ought to be given to the different subjects of study. Their proper function is to improve the methods of instruction; they have no mandate to determine its content as well (Bestor, 1956, p.256).

Another reason could be linked to economic efficiency. Taba acknowledges that “lately there has also been pressure towards a greater efficiency of curriculum because of an overabundance of students and shortages of facilities and teachers” (Taba, 1962, p. 264).

During the progressive era, when talks of extending the traditional curriculum beyond high school and into elementary school, resources to find teachers who would be well versed enough in the traditional subjects were already strained for high school much less elementary school (Eliot & Robinson, 1984). It would seem to be a logical conclusion that during the sixties this strain on finding qualified teachers to teach the traditional curriculum would still be a problem. Moreover, teaching the traditional curriculum to students from the “bottom of the pile,” as Taba referred to them (Taba, 1964), would most likely extend the schooling of these students given the cultural deficits these children had which impeded learning. Finally, perhaps the Taba curriculum was not just a pure

exploration of the soundest form of pedagogy, rather it was a pragmatic approach to account for the underqualified and continued lack teachers in the United States.

Conducting the conduct of teachers through the Taba Curriculum

The Taba curriculum is often cited as being teacher-centered and having a grassroots approach rather than an administrative top-down approach giving more autonomy and credibility to the profession of teaching (Oliva, 2005; Ornstein & Hunkins, 2009; Laanemets & Kalamees-Ruubel, 2013; Portillo, et al., 2020). This is an interesting interpretation of Taba since the fourth part of her book, the strategy of curriculum change, attempted to provide a methodology for curriculum developers, not teachers, to change school curriculum. Indeed, when Taba mentioned the “grass roots approach” in curriculum development, it was regarding a trend in education where teachers were given more autonomy and “curriculum outlines became more diversified and were regarded as resources rather than as prescriptions” (Taba, 1962, p. 448). She then remarked that although this form of curriculum development was the prevalent method of her time, a shift in method was imminent as “a feeling is being expressed that school programs are too diverse and chaotic” and “that their content is inadequate” and a national curriculum commission is needed (Taba, 1962, p. 455).

Taba believed that the work curriculum developers needed to establish with teachers was two-fold: increasing teacher knowledge on curriculum methods and change their behavior and mindset to accept change. “An effective strategy of curriculum change, therefore, must proceed on a double agenda, working simultaneously to change ideas about curricula and to change human dynamics (Taba, 1962, p. 455).” She thought that curriculum developers needed to change teachers’ ideas regarding curriculum theory because teachers had limited knowledge in it. She stated:

Teachers are expected to make decisions which require theoretical insights into curriculum even though they do not have such insights. There are expectations that students and teachers in their classrooms will organize the curriculum, that they will outline the topics and decide what to study about each. This, too, seems apt to lead to a thoughtless plan (Taba, 1962, p. 452).

Not only did teachers not understand curriculum theory, but she also believed they had a limited understanding of their subject matter, and therefore could not apply their subject matter to curriculum theory. She argued:

While teachers, on the whole, are fairly competent in their respective subject areas, this competency tends to be limited to the factual details and does not represent disciplined knowledge, nor always an up-to-date grasp of their subjects. They need help in weeding out the chaff and in determining the important ideas (Taba, 1962, pp. 480-481).

Furthermore, Taba warned against over romanticising the involvement of teachers to achieve democratic participation “The decision on participation must rest on who can best do what, and not on a sentimental concept of democratic participation” (Taba, 1962, p. 452).

The participation of teachers concerning curriculum development seemed to be only relevant on two aspects (1) achieving buy-in (2) prototyping the curriculum for improvement. The ‘human dynamics’ that Taba believed that curriculum developers needed to be aware of was resistance to change. She felt that obtaining engagement from teachers was a strategy to minimize resistance to change. She stated:

Unless those who are using the curriculum have some part in determining it, they will resist any change[...]. But this is far from saying that everyone affected by the curriculum must also take part in every decision, such as what the scope and sequences should be (Taba, 1962, p. 450).

Taba’s objective was to create curriculum guides that would be robust enough to use in multiple settings and with varied student populations. To reach this objective, the curriculum guides needed to be tested in “in different classrooms and under varied conditions to establish their validity and teachability and to set their upper and lower limits of required abilities” (Taba, 1962, p. 450). The creation of robust curriculum guides and the involvement of teachers in the development of these curriculum guides points to a belief that the role of the teacher is that of a Thorndikean technician. Here is the real tension in Taba’s thinking, can thinking be taught to students when the teachers themselves are not encouraged to think?

The role and contribution of teachers in a Taba Curriculum is best illustrated in the *Final Report of the Taba Curriculum Development Project in Social Studies for the Contra Costa Department of Education in California*. Chapter Three, Dissemination of the Curriculum, discussed the different skills that teachers needed to learn to implement the curriculum, the training models used to ensure these skills were acquired, and finally feedback from teachers. The Taba Curriculum relied on questions to progress the thinking process. Therefore, teachers needed to be trained in formulating and using open-ended questions, question sequencing, and reviewing student feedback. As an example, one of the training formats consisted of ten day-long workshops spread over a period of a year and a half. Amongst the materials for the training program, were video and audio tapes of

classroom discussions, observations worksheets and guides for analyzing discussions, the teachers' handbook, and pamphlets of readings that served as a guide to understand the theoretical underpinnings of the rationale behind the Taba Curriculum. The idea was to create a training program where those who had undergone the training with the curriculum developers, would then be able to train other teachers in their schools, and eventually, support from curriculum developers would lessen in time.

Regarding the feedback from the teachers, the report mentioned an interesting observation regarding the question: "How would you rate this curriculum alongside other social studies programs you have taught?" While 63 of the 69 teachers rated the (unrevised) curriculum "better in some respects" or "much better" there was a slight tendency for persons with less teaching experience to rate the program more highly. There was also a tendency for the teachers with Master degrees to offer more constructive criticism of the curriculum than did those with Bachelor degrees (Wallen et al, 1969). Unsurprisingly new teachers welcomed pre-packaged teaching materials, whereas experienced teachers were able to engage more critically with the course content and provide more feedback on alterations. The reports reasoned that a possible interpretation of this tendency was the lack of insight in the rationale of programs. More specifically, there seemed to be a lack of understanding on how programs supported the thinking and the learning process.

Conclusion

The passing of the Elementary and Secondary Education Act of 1965 and the federal government's increase of federal aid between 1960-1970 to elementary and secondary schools from half a billion to three and a half billion dollars was done to address the issues of educational equality for students from poor and disadvantaged backgrounds (Kantor, 1991). This shift in educational policy may be what enabled the Taba Curriculum to see its implementation in the Development Project in Social Studies for the Contra Costa Department of Education in California.

As Taba constructed the *savoir* that is her curriculum theory, she suggested using theories from anthropology, social psychology, and sociological studies to enable schools to address the cultural conflicts that arise in modern society linked to heterogeneous populations, advancements in technology, and other undetermined societal changes that would inevitably arise. Although she attempted to use a broader understanding of culture and field theory to move beyond a Thorndikean behaviorist form of learning, her curriculum still called for observable learning objectives. Attempting to derive that objective using

theories beyond Thorndike, does not negate the narrowed goal of learning – something which again points to ontological and epistemological tensions.

Moreover, Taba's belief that teachers lacked the theoretical knowledge in learning and were limited in their knowledge regarding subject matter, allowed Taba to load her curriculum with both. Her curriculum is designed to influence teachers in not only conceiving and practicing learning in a particular way, but also to what extent depth in subject matter knowledge is necessary. Arguably, rather than adding to teachers' knowledge of learning and general knowledge, the Taba curriculum narrows down to what she believes is essential for teachers to know and practice thereby conducting their conduct. Arguably, Taba's *savoir* became a *connaissance* as it was implemented by the teachers during the Development Project in Social Studies for Contra Costa. The training process and all training materials inculcated the Social Studies teachers of Contra Costa into Taba's formulation of objectives-based learning.

Chapter 6

Introduction

The state is not a universal nor in itself an autonomous source of power. The state is nothing else but the effect, the profile, the mobile shape of a perpetual stratification (etatisation) or statifications, in the sense of incessant transactions which modify, or move, or drastically change, or insidiously shift sources of finance, modes of investment, decision-making centers, forms and types of control, relationships between local powers, the central authority, and so on (Foucault, 2010, p. 77).

This chapter will show how the publication of a Nation at Risk created a political strategy of “excellence” which formed an educational episteme of standards, assessments, and accountability. This chapter will examine the various layers that contributed to its formation. It will look at how incompatible educational practices such as curriculum ideas from traditional and progressive education and testing and competition from administrative education were brought together under the banner of “excellence.” It will also look at how the development of national educational goals contributed to this episteme by shifting sources of financing at the federal and state levels. The creation of national educational goals also amplified the role of state governors and their influence over state educational goals in pursuit of excellence. Through this episteme, the behaviorist objectives-based form of learning became generalized in the form of state and national standards and assessments to evidence “excellence.”

This chapter situates the publication of *Understanding by Design* (1998) at the height of the standards and assessments movement. Wiggins and McTighe challenged some practices in this movement and attempted to mitigate the deterministic nature of behaviorist objectives-based learning that underpinned this movement by elucidating deeper forms of learning. However, I believe that the more prominent result of their work was providing a rationale behind standards and facilitating the creation of a curriculum that aligns to those standards.

The critical questions that guided this chapter were as follows: *How did the shift from “equality” to “excellence” change educational discourse in America? How did educational ideas and practices resurface in this new educational environment? How did objectives-based learning and Backwards Design become crystallized in the American curriculum and so become a dominant form to govern the conduct of conduct?*

Shifting from Equality to Excellence

The American education system in the 1960s needed to adapt to the democratization of education for minorities, women, and the poor (Urban & Wragoner, 2013). As stated in the previous chapter, many laws and reforms were passed along with federal funding to meet the changing demands of society. Altbach (1995) argues that a push for a technically driven maths and science due to the launch of Sputnik waned and arguably, schools lost focus on their academic mission and emphasized social needs as it was easier to reform schools after the civil rights movement than “change housing patterns or redistribute income” (Altbach, 1995, p. 338). Federal funding in the 60s saw increased development of new school programs, such as curriculum development, to improve educational equality, but the following decade could not sustain these new developments (Altbach, 1995).

The 1970s saw fewer educational reforms (Urban & Wragoner, 2013) and the economic recession in the 70s led to diminished school funding and stagnant teacher salaries (Altbach, 1995). Perhaps the most notable development in education during the 70s was the creation of the Department of Education at the cabinet level. It was established by President Carter in 1977 although he was not a strong proponent of a heavy federal hand in education (Urban & Wragoner, 2013). Elevating the Department of Education to cabinet level allowed for more resources to be allocated to this department, which strengthened the influence of the federal government over states in educational matters. Although Reagan campaigned to abolish the Department of Education by removing federal control and allowing for more state control, his appointment of Terrel H. Bell to Secretary of Education may have unintentionally done the opposite (Hunt & Staton, 1996; Urban & Wragoner, 2013). The Department of Education at the cabinet level could now develop a cohesive strategy for educational development, and the mechanism to enable the states to implement these strategies. With Bell, the 1980s saw a shift in educational focus: from equality to excellence (Altbach, 1995; Urban & Wragoner, 2013).

A Nation at Risk and the development of National Educational Goals

Terrel H. Bell created the National Commission on Excellence in Education (NCEE) to spur reform in education and address what he perceived as national discontent regarding education and an overall national malaise due to inflation, high interest rates, widespread unemployment in youth, particularly minority youth (Hunt & Staton, 1996). In April 1983, the National Commission on Excellence in Education published *A Nation at Risk: The*

Imperative for Educational Reform. A few days after the publication, President Reagan described to the American people the conclusion of the report: the failure of the American education system. Even though the report found that “the average citizen today is better educated and more knowledgeable than the average citizen a generation ago – more literate and exposed to more mathematics, literature, and science” (NCEE, 1983, p. 12) these advancements in education were not sufficient. The democratization of education meant that the national average of high school graduates and college students’ knowledge in standardized tests dropped below that of the average of 25-30 years previously when a “much smaller population completed high school and college” (NCEE, 1983, p. 13). Rather than focusing reform efforts on the populations that dropped this average, a whole nationwide school reformation was demanded.

The NCEE report called into question the focus of schools which were “routinely called on to provide solutions to personal, social, and political problems that the home and other institutions either will not or cannot resolve” (NCEE, 1983, p. 9). Following a more traditionalist perspective, the report promoted a curriculum that was based on rigor that demanded high expectations of students which translated to adopting a curriculum that focused on ‘Five New Basics’ (English, mathematics, science, social studies, computer science, and for college bound students – foreign language). The report argued that more time learning these subjects was needed. The report authors, however, did not evoke tradition to bolster their arguments: they used ‘excellence’:

We define "excellence" to mean several related things. At the level of the individual learner, it means performing on the boundary of individual ability in ways that test and push back personal limits, in school and in the workplace. Excellence characterizes a school or college that sets high expectations and goals for all learners, then tries in every way possible to help students reach them. Excellence characterizes a society that has adopted these policies, for it will then be prepared through the education and skill of its people to respond to the challenges of a rapidly changing world. Our Nation's people and its schools and colleges must be committed to achieving excellence in all these senses (NCEE, 1983, p. 14).

What is interesting to note here is the fusion of high expectations regarding subject matter and advocacy for individual learners. As I have shown in the previous chapters, apart from Dewey, advocates for individualized learning (Hall, Thorndike, Tyler, Taba) tended to be in opposition to the study of rigorous subject matter content. Individualized learning was a way to identify the specific needs of the individual and provide them with the education they needed to be functioning members of a democratic society. A main charge against the

traditional academic curriculum was that rigorous study of subject content was not necessary to achieve this.

Although the *Nation at Risk* report underlined how the values of democracy and the continued strength of the social fabric is tied to the education of the masses, it argued that education should deal with more than just the creation of a democratic society. The authors reused the need to be technologically ‘literate’ as an argument to reform the education system, as in its current state the report found that it was inadequate. The notable shift in rhetoric however was the need to be competitive in the global market. After Sputnik, the need to be technologically advanced was linked to national security. Now the report linked this need to international industry and global commerce:

The world is indeed one global village. We live among determined, well-educated, and strongly motivated competitors. We compete with them for international standing and markets, not only with products but also with the ideas of our laboratories and neighborhood workshops. America’s position in the world may once have been reasonably secure with only a few exceptionally well-trained men and women (NCEE, 1983, p. 10).

The report estimated that by the turn of the century, millions of jobs would be linked to technology and robotics. The report links this trend with global competition and the fear of other countries surpassing the United States technologically. The report argues that if the United States wants to continue being a global leader, and take part in the knowledge economy, then it will be difficult to do so because the current education system is inferior to the education systems of other industrialized countries. If the United States wants to continue being a leader of the world, it must invest in becoming a knowledge economy and learning society. This shift in rhetoric created a discourse of a failing education system that needed to change to create the knowledge economy that would support the US to remain globally competitive. This is how the expectation of excellence, on every level – all students, graduates, teachers, schools - was promoted.

Following the publication of *A Nation at Risk*, some states and organizations began to develop educational reforms such as content standards across the subjects (Savage & O’Connor, 2015). However, the two most significant developments influenced by *A Nation at Risk* were (1) the publication of *Curriculum and Evaluation Standards for School Mathematics* by the National Council of Teachers of Mathematics in 1989 (Cho & Trent 2005) and (2) the 1989 federal initiative of President Bush to establish the National Education Goals. Both events led to the national educational standards movement that defined education in the 1990s.

Bush announced the following National Education Goals to be achieved by the year 2000:

1. all children in America will start school ready to learn;
2. high school graduation rate will increase to at least 90 percent;
3. students will demonstrated competency in subjects such as English, mathematics, science, history, and geography;
4. American students will be 'first in the world' in science and mathematics achievement;
5. every adult American will be literate and have the knowledge and skills needed to be competitive in a global economy;
6. all schools will be free from drugs, alcohol, firearms and violence (Heise, 1994).

The articulation of the National Education Goals marks the influence of the Federal government in achieving nation-wide unity towards a political strategy of excellence in education. To determine the success of achieving these goals, national standards and assessments were put forward.

The *Raising Standards for American Education* report published by the National Council on Education Standards and Testing (1992) argued that the development of national standards and a mechanism of testing would better track progress towards achieving the National Educational Goals:

The council finds a need to shift the basis of educational accountability away from measures of inputs and processes to evidence of progress toward desired outcomes...A nationally coordinated initiative would result in high-quality outcome measures that can be used for accountability (National Council on Education Standards and Testing, 1992, p. 16).

Here we see a familiar logic in education reworked to meet the demands of "excellence." This logic would hold states, districts, schools, and teachers accountable to excellence by measuring their output. The logic of behavioral objectives put forward by Thorndike, with the addition of assessments by Tyler and Taba, to determine the extent to which an individual has learned, was now generalized to the school, district, state, and national level in the form of standards. Educational standards determined the desired outcomes of learning, and testing linked to these outcomes provided the evidence needed to determine if the standards were achieved.

The *Raising Standards for American Education* demonstrated the feasibility of the creation of these standards by briefly outlining some possible guidelines in creating

standards for each subject area. The report pushed for more innovative assessments and acknowledged that the movement for performance-based assessment was a key to the future of education, but also cautioned that traditional methods of testing should not be dismissed too hastily. The report was quickly met with rebuttal. For example, *National Educational Standards and Testing: A Response to the Recommendations of the National Council on Education Standards and Testing* was written only a month later by proponents of performance-based assessments. This report did not undermine the necessity for creating standards in education, rather it focused its criticism on the types of assessment that was proposed (Koretz et al., 1992). This tension regarding assessments will be further developed in the next section.

In 1994, Congress passed Goals 2000. Goals 2000 built upon the *National Education Goals* and established the National Education Standards and Improvement Council (Heise, 1994). This led to greater federal involvement in education policy:

Specifically, Goals 2000 will increase the federalization-shift in control from state and local governments to the federal government-of American educational policy. The duties assigned to the newly created National Education Standards and Improvement Council' 7 ("NESIC") will increase federal authority over educational policy, thereby diminishing state and local control (Heise, 1994, p. 348).

Furthermore, Goals 2000 awarded grants to national groups of teachers and scholars to develop standards in English, Science, History, Mathematics, and Geography (Ravitch 1996). As different groups came together to develop standards, the multiplication of power to legitimize objectives-based learning increased and in turn further crystallized the standards, assessment, accountability episteme.

A Nation at Risk, the *National Education Goals* and Goals 2000 are examples of the shift in influence of the federal government in education. However, rather than seeing the role of the federal government as an autonomous source of power that enforced measures to abide by them, these federal initiatives may be better understood as avenues in which existing practices could be aligned with. In this way, these existing practices could continue to exist by being reinterpreted for the purpose of excellence.

Development of State Standards and Assessments in the 1990s: A top-down approach?

Although the role of the federal government in education was foregrounded through Goals 2000, states were already moving towards the adoption of standards to address the growing

perception of the failure of public schools engendered after *A Nation at Risk*. The report *Educational Standards in the 50 States: 1990* tracked the changes of state standards between 1984-85 and 1989-90. It found that:

The state role in curriculum development has shifted in the last decade from one of technical assistance to one of mandating courses of study, performance objectives, and increasingly course content (Coley & Goertz, 1990, p. 16).

At the time, six states mandated minimum course content in elementary or secondary school, while nineteen established learning objectives and outcomes for most subject areas and required local school districts to incorporate them into curricula. A further sixteen states developed model curricula and curricular guides for local districts but did not enforce their use. Finally, eight states reported that their role was to define the subject areas and number and types of courses that must be taught in elementary and secondary schools (Coley & Goertz, 1990). The report also highlighted that “increasingly, states are linking their mandated assessment programs to their curriculum standards” (Coley & Goertz, 1990, p. 17).

Another, perhaps more discrete, driving force behind the development of state standards could be due to the change of argument in litigations for school financing. States raise revenue for financing schools and these funds may be subject to court litigation to reallocate these funds. During the 1970s and the 1980s, state litigation for school financing was focused on ensuring equal distribution of financial resources throughout the different school districts. At this time, schools in poor districts had less funding since a main source of school funding were through property taxes. However, the 1990s marked a shift in argument from ensuring equal distribution of funds to poorer districts to the ability of the states to meet “their obligation to provide quality of education mandated by their constitutions” (Hurst et al., 2003, p. 40). This shift in argument necessitated that the states define what is quality education, thus they turned to the development of state standards.

Standards

The publication of *Curriculum and Evaluation Standards for School Mathematics* by the National Council of Teachers of Mathematics in 1989 marked the opening of nationwide acceptance of subject area standards. At the time, it was hailed as the holy grail of standards (Massell 1994; Collins 1995). Collins (1995) argues that this publication placed the term “standards” into the education reform lexicon. Baker (1994) comments that support for these national standards came from three main sources. First, interest in the development of

education from businesses and industries. Second, subject-matter-focused professional organizations wanting to remodel the school curricula to reflect modern conceptions of learning. And third, policy experts who believed that standards and assessments would provide the necessary framework for educational reform (Baker 1994).

However, not all subject area standards were accepted as readily as the mathematics standards. The National Standards for United States History were criticized, according to Stern (1994) for the “egregious and politically motivated selection of material” (p.61). A 99 to 1 vote by the United States Senate on January 18, 1995, condemned “the standards for bias against American history, ideas, and institutions” (Stern, 1994, p. 61). The national English standards published by the National Council of Teachers of English and the International Reading Association were also publicly derided (Ravitch, 1996). Ravitch argued that including “concerned citizens who live outside the academic world” in their development “would have added immeasurably to the value and credibility of the history and English standards” (Ravitch, 1996, p. 8). Due to the funding provided by Goals 2000, many states moved towards the creation of standards, and with the passage of No Child Left Behind by President George W Bush in 2001, by the early 2000s “every state in the U.S. had adopted a system of standards and assessments and was using this system as an accountability mechanisms to promote school improvement” (Hamilton, Stecher, & Yuan, 2008, p. 29).

Assessments

Alongside standards were the assessments that became a key feature in educational accountability. In 1991, Congress authorized the creation of the National Council for Education Standards and Testing (NCEST). Within this organization, an Assessment Task Force was created to determine the best type of assessments to be used in conjunction with educational standards. The type of assessments to be used was a contentious issue in the early 90s with divergent assessment models. The “traditional” field of testing supported by psychometrics was being challenged by new experts in the field of education whose backgrounds were in learning, policy, and teaching studies who advocated performance-based assessments (Baker 1994). Advocates for performance-based assessments contended that traditional modes of testing “were mismatched with newer cognitive forms of teaching and learning” (Baker, 1994, p. 455). During the 80s, assessments were already viewed as economically efficient ways of providing “measurable outcomes by which the [policy] efforts could be judged and compared within and among states” (Urban & Wragoner, 2013, p. 327). Test scores were the proof needed to show that policy changes such as teacher

certification and regulation, financing, and testing programs, were improving education (Urban & Wragoner, 2013). Through the annual governor's meetings, state governors exchanged with each other concerning the educational process that were being used in their states. These tests, among other measures, allowed certain governors to earn the reputation of being "education governors," which eventually led to higher positions in national office: for example, Bill Clinton, George W. Bush, Lamar Alexander and Richard Reilly who eventually became secretary of Education (Urban & Wragoner, 2013).

By the early 1990s performance-based assessments were gaining ground. Thurlow writes that:

As states jumped into the assessment business, however, the idea that assessments would be "authentic" took a back seat to the need to have large-scale assessments that were valid and reliable. Authentic assessments are expensive, particularly when an attempt is made to incorporate them into large-scale assessments. They are also difficult to design or implement in a way that results in highly reliable or valid measurements" (Thurlow, 2002, pp. 196-197).

When states realized the financial ramifications of performance-based assessments, they rapidly fell out of fashion. It may be worth mentioning that the major contention that arose regarding standards and assessments were not against the logic of standards and assessments themselves. The major contentions were regarding the content that would be used in their application. This points to a consensus on its usage, thus an acceptance of this episteme.

Teaching was also affected by the standards and assessment movement. The National Science Education Standards included standards for content, teaching, and assessment with the caveat that these three components are comparable to a three-legged chair, "if one leg is missing, the reform will not stand" (Collins, 1995, p. 32). A report published ten years after *A Nation at Risk* found that teachers were not initially hired based on their competence. Instead, "schools were more likely to have evaluation systems in place that rewarded superior teachers, encouraged average ones, and promoted either improvement of poor teachers or their termination" (Edwards & Allread, 1993, p. 86) In the same report it was found that there were many untrained teachers in the areas of math and science to make up for the shortages of teachers in these areas. In the 90s, the creation of professional standards gained momentum to change the process of how teachers were trained and certified (Hurst et al., 2003). These standards specified coursework and requirements needed to obtain a teaching certification for each state. Although these standards were created, alternate routes to obtain teachers in classrooms circumvented these standards.

Low credibility of teacher education programs in the university was a reason cited for the rise in alternative teacher preparation programs in the 90s (Roth, 1994; Hurst et al., 2003). These programs sought to attract recent graduates with degrees in mathematics and natural sciences to help alleviate the teacher shortage in these subject areas (Urban & Wragoner, 2013). By 1990, 48 states reported to having alternative certification programs for teachers (Roth, 1994). Alternative programs varied in teacher preparation where some “actually provided for full preparation for certification,” though many required “only limited preparation, particularly prior to assignment to a classroom” (Roth, 1994, p. 266) One example of such a program was Teach for America created in 1990. This was criticized for its short 8-week teacher preparation period that impacted young graduates’ ability to teach effectively and created teacher burnout which had a negative impact on students in poor and urban districts (Darling, 1994). Nevertheless, its mission to recruit from top universities in America and “elevate the image of teaching” (Roth, 1994, p. 261) dovetailed well with the agenda of “excellence” in education (Urban & Wragoner, 2013). By 1993, Teach for America was a charter member of AmeriCorps, a federally funded government program founded during the Clinton administration to fund programs that serviced in need communities (www.teachforamerica.org).

Understanding by Design: more than just backward design?

Understanding by Design (UbD) was written by Grant Wiggins and Jay McTighe in 1998 at the height of the standards and assessments movement in the United States. Chapter one of UbD unveiled their design process: backward design. This curriculum design process is what is most often cited when academics refer to Wiggins and McTighe (Carlson & Marshall, 2009; Graff, 2011; Fox & Doherty, 2012; Kerchner, Hardwick, & Thorton, 2012; Mills, Wiley, & Judy, 2019; Kelly & Arnett, 2021; Bopardiker, Mutch-Jones, Gasga, Csikari & Chmiel, 2022). Although gaining in popularity, backwards design is not original. Wiggins and McTighe admitted that backward design was “hardly radical” given that Ralph Tyler “described the logic of backward design clearly and succinctly about 50 years ago” (1998, p. 8). Additionally, much of Wiggins and McTighe’s ideas on learning were similar to Hilda Taba’s, though couched in different language.

Tyler and Taba were able to justify the relevance of their versions of objectives-based learning and its associated practices through the problematization of traditional schooling. Wiggins and McTighe, however, are working through different “conditions of possibility”

(Foucault, 1970, p. 168). Under this new episteme, Wiggins and McTighe attempt to engage their version of objectives-based learning with standards by framing UbD as an *additive to* rather than an *opposition to* standards. However, a closer analysis of their work in relation to the standards that were published at the time suggests that, rather than aiding the standards to provide greater depth in understanding for students, UbD is simply a guide to understand the logic and framework of standards-based learning. Users of UbD then become complicit agents to the regimes of truth that are objectives-based learning, outcomes-based learning, and standards-based learning.

Wiggins and McTighe purported that standards could, “unhelpfully suggest that didactic teaching and rote learning will be sufficient for learning” (Wiggins & McTighe, 1998, p. 23). Throughout UbD, they argue against teaching strategies that focus on linear content coverage and simplistic high-stakes exams which rely on memorization of facts. Wiggins and McTighe argue that these elements have become standard practice in education, but UbD provides an alternative way of for teachers to engage in their practice. Here they explain what the text will do:

offering a step-by-step guide, the book provides a conceptual framework, design process and template, and an accompanying set of design standards. We offer no specific curriculum but rather a way to design or redesign any curriculum to make student understanding more likely (Wiggins & McTighe, 1998, 5).

However, rather than moving away from the standards and providing an alternative framework to conceptualize learning and understanding, what UbD proposed is a method to design understanding into the standards framework. Wiggins and McTighe justify the inclusion of standards into curriculum design by referring to it as a professional constraint. As in other professions, teachers must operate within constraints, and Wiggins and McTighe believe that standards are the constraints teachers had to work with. Backward design was a way to “operationalize [...] standards in terms of assessment evidence” (1998, p. 8).

Wiggins and McTighe’s attempt to work within a standards framework brought two key tensions that I will explore: obtaining depth of understanding within a normative procedural approach to learning, and attempting to elevate the role of a teacher in a highly prescriptive environment.

Understanding

Wiggins and McTighe (1998) theorized six facets of understanding: (1) explanation (2) interpretation (3) application (4) perspective (5) empathy (6) self-knowledge. Explanation would enable students to respond to questions such as:

Why is that so? What explains such events? What accounts for such action? How can we prove it? To what is this connected? How does this work? What is implied? (Wiggins & McTighe, 1998, p. 45).

Explanation should help students understand the why and how of ideas, events, and actions.

Facet two, interpretation would answer the questions:

What does it mean? Why does it matter? What of it? What does it illustrate or illuminate in human experience? How does it relate to me? What makes sense? (Wiggins & McTighe, 1998, p. 48).

Wiggins and McTighe argue that interpretation helps students create a narrative around disorganized facts and abstract ideas. This helps understanding by creating meaning behind facts and ideas. This not only transforms their understanding but also their perception of these facts and ideas. Facet three, application, would answer the questions:

How and where can we use this knowledge, skill, or process? How should my thinking and action be modified to meet the demands of this particular situation? (Wiggins & McTighe, 1998, p. 51).

Through this facet, a student should be able to display their understanding by applying their knowledge in context. The application of this knowledge should include not only its use, but also the adaptation, the customization, and the limitations of its use based on context, purpose, and audience.

Facet four, perspective, would answer questions such as:

From whose point of view? From which vantage point? What is assumed or tacit that needs to be made explicit and considered? What is justified or warranted? Is there adequate evidence? Is it reasonable? What are the strengths and weaknesses of the idea? Is it plausible? What are its limits? So what? (Wiggins & McTighe, 1998, p. 53).

Perspective asked the students to remove their opinion, emotions, and societal context and recognize that problems are complex and can have a multitude of responses. These responses should all have their own point of view. Armed with this understanding, students should

begin to see all knowledge as having a particular point of view and should alert them to “what is taken for granted, assumed, overlooked, and or glossed over in an inquiry or theory” (Wiggins & McTighe, 1998, p. 53). Wiggins and McTighe further note that this facet is particularly important in developing insight and developing innovation as shifting perspective was what allowed for the creation of new ideas, application, and stories.

Facet five, empathy, should answer questions such as:

How does it seem to you? What do they see that I don't? What do I need to experience if I am to understand? What was the artist or performer feeling, seeing, and trying to me feel and see? (Wiggins & McTighe, 1998, p. 55).

Unlike *perspective* which asked students to take an objective view of the subject, empathy requires acknowledgment of the feelings and circumstances of others so that their actions and thoughts can be better understood. Finally, facet six, self-knowledge, was the ability to answer:

How does who I am shape my views? What are the limits of my understanding? What are my blind spots? What am I prone to misunderstand because of prejudice, habit, or style? (Wiggins & McTighe, 1998, p. 57).

Wiggins and McTighe theorize that for someone to understand the world they must first understand themselves. Without knowing what drives one's own propensity to find particular ideas valid, individuals are subject to a simplistic, black-or-white vision of the world.

Throughout the two chapters devoted to developing their theory of understanding, Wiggins and McTighe rely on the works of Benjamin Bloom, John Dewey, and Jerome Bruner. Clearly, they are attempting to concisely explain to the reader the complexities of learning and understanding. Unfortunately, in abbreviating Dewey's work to only his thoughts on the mental processes of learning and ignoring the philosophical underpinning of his work, Wiggins and McTighe misrepresent it. Levin writes that Dewey was “committed to fostering conscious and latent interests and talents in children” rather than “basing instructional decisions or grouping practices on frequent, formal assessments of what they had mastered relative to peers” (Levin, 1991, p. 74). Yet, Wiggins and McTighe adapt Dewey's work to suit objectives-based learning, particularly when they intertwine ways of understanding with assessment.

Like Taba, Wiggins and McTighe try to position themselves away from a Thorndikean understanding of learning and testing. However, they stop short of positioning themselves in direct opposition to Thorndikean-type psychometric assessments (as previous advocates did in the NCEST Assessment Task Force). Wiggins and McTighe simply state: “We seek to expand the normal repertoire [of testing] to make sure that more appropriate diversity is found in classroom assessment” (1998, p. 6). They attempt to ‘expand the normal repertoire’ by aligning performance-based assessments with their six facets of understanding.

To create performance-based assessments, Wiggins and McTighe (1998) argue that teachers should be assessors, and that assessors should answer two questions. First, *where should we be looking to find hallmarks of understanding?* In other words, “the kinds of performance or behaviour” that shows students have understood (p.67). Second, *what should we look for in determining and distinguishing degrees of understanding?* That is, how does a teacher express and quantify the extent to which a student has understood (Wiggins & McTighe, 1998, p. 67)?

The first question is answered briefly with a comparative chart that describes questions that an assessor would ask versus questions an activity designer would ask:

Two Different Approaches	
Thinking Like an Assessor	Thinking Like an Activity Designer
What would be sufficient and revealing evidence of understanding?	What would be interesting and engaging activities on this topic?
What performance tasks must anchor the unit and focus the instructional work?	What resources and materials are available on this topic?
How will I be able to distinguish between those who really understand and those who don't? (though they may seem to?)	What will students be doing in and out of class? What assignments will be given?

Against what criteria will I distinguish work?	How will I give students a grade (and justify it to their parents)?
What misunderstandings are likely? How will I check for those?	Did the activities work? Why or why not?

Through this chart, Wiggins and McTighe emphasize that a superior curriculum is one where the answer to curriculum questions should always lead to a desired outcome. For them, a curriculum that is centered around activities “though logical from the perspective activity design” makes it “far less likely that the work will culminate in understanding or that we will have the evidence we need to judge whether such understanding has occurred” (Wiggins & McTighe, 1998, p. 68).

Here we can see a clear departure from Dewey. When it came to subject matter, Dewey believed that what concerns the teacher

is the ways in which that subject may become a part of experience, what there is in the child’s present that is usable with reference to it, how such elements are to be used, how his own knowledge of the subject-matter may assist in interpreting the child’s needs and doing (Dewey quoted in Simpson & Jackson, 2004, p. 26).

Dewey believed that the reaction of a child to an activity begins the process of the teacher understanding the learning that is happening within that child. Observing and interpreting the interaction that the child has with an activity is what informs the teachers’ subsequent decisions in how to further develop the child’s learning and understanding. For Dewey, a curriculum should not start with the end objective: the objective of learning will shift depending on the child and the activity and the teachers’ decision-making in response.

Wiggins and McTighe further suggest the use of an assessment tool: longitudinal rubrics. Their reason for this is that understanding “develops slowly and reveals itself as a progression along a continuum for any single idea; our assessments must better reflect this fact” (72). Although they concede that learning develops slowly and is progressive, they do not seem to consider how individualised the progress of learning could be. They cite the American Association for the Advancement of Science (1993) as an example of how understanding evolves according to the developmental stage of students. Objectives for

evolution are outlined for grades two, five, eight and twelve. Citing the American Association for the Advancement of Science suggests that the Wiggins and McTighe believe that there is a normative standard for the attainment of knowledge and the goal is for every student to display the attainment of this standard. Use of this rubric points more towards wanting a form of measurement to define where students are within this norm, rather than making room for an individual to develop understanding at their own pace and at their own level. The assumption seems to be that if teachers follow the UbD curriculum process, all students will obtain depth of understanding. If their assumption is wrong, then it leads to what? A measurable output. In other words, the proof needed to satisfy accountability measures.

Status of teachers

In the era of excellence, teachers also needed to be excellent. This is reflected in the way Wiggins and McTighe conceptualize the role of teachers in curriculum design. For them, teachers should be both learning and content specialists. Wiggins and McTighe argue that, to be effective curriculum designers, teachers must be capable of two things: understanding students well enough “to know what will need uncoverage from their point of view” and having expertise in the subject to be able to “get beyond inert textbook and curriculum framework language – to bring to life the important issues and people” (1998, p. 21).

According to Wiggins and McTighe, a “major challenge facing any designer is the inadequacy of most district, state, and national standards in helping clarify which are the big ideas and how best to uncover them” (1998, p. 23). Wiggins and McTighe believed that standards were often vague and encouraged rote learning. Therefore, what is worthy of understanding should be determined by four criteria: (1) it should be enduring (2) at the heart of the discipline (3) need uncoverage and (4) be potentially engaging.

To develop curricula with objectives that are filtered through these four criteria, Wiggins and McTighe suggest that curriculum be guided by essential questions. For UbD, essential questions are the objectives that drive the process of learning. Unlike Tyler, these are not behavioural or skills-bound but seem closer to Taba’s conception of fundamental knowledge. The characteristics of essential questions are that they: (1) go to the heart of the discipline; (2) raise other important questions; (3) provide subject- and topic- specific doorways to essential questions; (4) have no obvious “right” answer; (5) are deliberately framed to provoke and sustain student interest. Examples of essential questions provided

are: “Must a story have a moral, heroes, and villains? Do we always mean what we say and say what we mean? Is U.S. history a history of progress?” (Wiggins & McTighe, 1998, p. 35). Wiggins and McTighe elaborate further than Taba on how to obtain the fundamental knowledge or essential question that should drive the purpose of the curriculum.

Wiggins and McTighe positioned UbD as helping educators who “wish to develop greater in-depth understanding in their students” and “how should they go about it” (1998, p. 5). Standards alone were inadequate for this task. However, when examining the standards that were being produced at the time, they were already in line with Wiggins and McTighe’s theory and process. For example, in the *NY State Learning Standards for English Language Arts* (The University of the state of New York, Regents of the University, 1996) for the intermediate level, standard three specified how students will read and speak for critical analysis and evaluation:

Listening and reading to analyze and evaluate experiences, ideas, information and issues requires using evaluate criteria from a variety of perspectives and recognizing the difference in evaluations based on different sets of criteria (p.11).

Some of the criteria the standards listed were:

- Understand that within any group, there are many different points of view depending on the particular interests and values of the individual, and recognize those differences in perspective in texts and presentations
- Evaluate their own and others’ work based on a variety of criteria and recognize the varying effectiveness of different approaches (p.11)

Finally, the standards suggested some examples of evidence to show attainment:

- Read two conflicting reviews of a popular movie and recognize the different criteria the critics were using to evaluate the significance of a lab experiment
- Point out examples of propaganda techniques (such as “bandwagon,” “plain folks” language, and “sweeping generalities”) in public documents and speeches (p.11)

Even in this small example, it can be seen how Wiggins and McTighe’s six facets of understanding (1) explanation (2) interpretation (3) application (4) perspective (5) empathy (6) self-knowledge would be applicable to the standard. Rather than producing a body of work that helped the teacher “to get beyond inert textbook and curriculum framework language – to bring to life the important issues and people ” (Wiggins & McTighe, 1998, p.

21), what UbD provides for its user is the logic behind how standards are written and how they might be operationalized by the reader. This is perhaps why UbD is often truncated to just backwards design because the logic of standards and objectives became the ultimate end point of learning. Their attempts to provide a more substantial form of learning that the standards could provide, seems to lead the curriculum designer back to the standards rather than improving upon them. Indeed, UbD provide a blueprint to the logic of standards the drives the design of the curriculum. Through UbD, Wiggins and McTighe added to the creation of teachers as subjects of a standards-based learning regime.

Conclusion

After its publication in 1998, UbD gained national and international popularity. The popularity of backward design could be attributed to the passage of No Child Left Behind Act (2001) mandated in all 50 states to provide accountability measures in the form of standards and testing to receive federal funding which crystallized the logic and practice of outcomes-based learning into federal legislation. Furthermore, through Wiggins and McTighe's educational enterprises ('Authentic Education' and 'MAC: McTighe and Associates Consulting' respectively), the national and global reach of their educational approach continues to grow. According to their website, prior to his death in 2015, Grant Wiggins

worked on some of the most influential reform initiatives in the world, including Ted Sizer's Coalition of Essential Schools, the International Baccalaureate Program, the Advanced Placement Program; state reform initiatives in New Jersey, New York, and Delaware; and national reforms in China, the Philippines, and Thailand.⁷

Today, Authentic Education continues to operate in school districts across the United States and throughout the world by promoting UbD and backwards design in the form of coaching, workshops, and consultations. Prior to the creation of his company, McTighe worked extensively in the Maryland education system. McTighe's company⁸, MAC now operates similarly to Authentic Education, in that it provides UbD and backwards design consulting

⁷ <https://authenticeducation.org/the-ae-team/grant-wiggins/>

⁸ <https://jaymctighe.com/biography/>

services to “schools, districts, regional service agencies and state departments of education” nationally and internationally⁹.

UbD has also moved into tertiary education systems. In University Learning Centers¹⁰ across North America, Wiggins and McTighe’s concept of Understanding by Design is often referred to for curriculum design, although reduced to backward design: the three-step process that started with the objectives, assessments, and ends with activities. Although outcomes-based learning was already in development during the 1980s and 1990s in English speaking countries abroad (such as the UK, New Zealand, Australia, and South Africa) (Brogger, 2019), UbD’s popularity in tertiary education systems internationally can be linked to the Bologna Process in 1999 which introduced new education standards that European countries volunteered to implement. In 2007, the Bologna Stocktaking Report “emphasized that all countries need to use learning outcomes as a basis for their national qualifications framework, systems for credit transfer and accumulation, and quality assurance” (Brogger, 2019, p. 159). Many international academics now use backward design as process to create their curriculum in higher education (Carlson & Marshall, 2009; Graff, 2011; Fox & Doherty, 2012; Kerchner, Hardwick, & Thorton, 2012; Mills, Wiley, & Judy, 2019; Kelly & Arnett, 2021; Bopardiker, Mutch-Jones, Gasga, Csikari & Chmiel, 2022).

⁹ <https://jaymctighe.com/>

¹⁰ Ontario Tech Teaching and Learning Center (<https://tlc.ontariotechu.ca/teaching/course-design/backwards-design.php>), Center for Innovative Teaching and Learning University of Indianapolis (<https://citl.indiana.edu/teaching-resources/course-design/backward-course-design/index.html>) The Center for Teaching and Learning Champlain College (<https://ctl.champlain.edu/kb/backwards-design/>), Center for Teaching and Assessment of Learning University of Delaware (<https://ctal.udel.edu/resources-2/backward-design/>), Center for Teaching and Learning Kent State University (<https://www.kent.edu/ctl/backward-design/>), Teaching Center University of Rochester (<https://www.rochester.edu/college/teaching/teaching-online/backward-design.html>), Teaching and Learning Center City University of New York (<https://tlc.common.gc.cuny.edu/using-backwards-design-a-practical-guide-to-creating-assignments/>), Center for Education Innovation & Learning in the Sciences UCLA (<https://ceils.ucla.edu/map-your-course-with-backward-design/>)

Chapter Seven: Discussion and conclusion

The purpose of this research was to understand how backward design shaped my beliefs, attitudes, and practice. Using a Foucauldian genealogical analysis to answer this question allowed me to trace how backward design emerged as a dominant approach to curriculum design. The genealogy allowed me to challenge the validity of the usage of backward design by tracing its emergence and how it has been reworked to meet the problems education was tasked to solve in different eras. This chapter will first discuss the main findings of this genealogical tracing, then move on to explore the answer to the main research question through discussion of the findings of the genealogy.

The use of a Foucauldian genealogy was a laborious task. To undertake this methodology in the best of conditions one must really immerse oneself first in Foucault, then in the history of the genealogical subject, and then find oneself in that process of immersion. As an EdD student it was difficult to fully immerse myself: a full-time job limits the amount of immersion that can take place. It was difficult to find the time and space to work consistently on the genealogy. Moreover, the threads of a genealogy are unlike the threads of an unfinished scarf. One simply can't just pick up right where they left off and continue the knitting project. To get back into a genealogy took time, and it seemed that every time I became comfortable again in the genealogy, I was pulled away again. Another difficulty in using the genealogy is deciding on which ideas should be traced. In the end, I chose to trace the ideas and focus on the aspects that had importance in my professional work, but I acknowledge that another person conducting a genealogy of the same subject may trace different ideas, or similar ideas but reaching different conclusions about what they have traced.

Understanding backward design through genealogy

My genealogy allows me now to respond to the subquestions of my research:

- How has backward design gained legitimacy as an approach to teaching and learning?
- Why has objectives-based instruction come to have such a dominant role in education, particularly in the United States?

Backward design gained legitimacy as an approach to teaching and learning over time and through various *savoirs* that developed during the 20th century shaping professional thinking and practice. Backward design is a reiteration of a curriculum making process that emerged from the progressive movement in the United States. The progressive educational

movement problematized traditional schooling, questioning if an education model made for the social elite could be democratized for the masses. The progressive movement developed multiple *savoirs*: child development, social efficiency, and social meliorist. Each of these *savoirs* can be linked to attempts to address different problems that arose due to industrialization, urbanization and American expansion. Analysing these *savoirs* using key historical figures in these movements allowed me to see that the creation of these *savoirs* were underpinned by already existing discourses: capitalism, eugenics, and democracy.

The discourses that underpinned these burgeoning educational *savoirs* were ontologically and epistemologically distinctive, relating to frameworks of capitalism, eugenics, and democracy. The educational theories underpinned by capitalism (framed within the idea of an economically driven society) were based on efficiency and cost effectiveness and these were paramount in defining the creation of mass education. Eugenicists framed the education system through a belief that there was a hierarchy within the human population that derived from genetic makeup. At times, the ideas functioning within this framework were compatible with capitalism as both discourses limited access to high levels of education to the masses. However, at other times these two discourses conflicted in using education to efficiently prepare individuals for the labor market. Finally, the theories underpinned by a democratic epistemology and ontology hoped to develop an education system that created enlightened individuals to take part in a democratic society. For them, individuals should not be limited by lack of access to education, but providing this access proved to be difficult to implement.

Although these *savoirs* created epistemological and ontological tensions, educators were less concerned with philosophical tensions and more interested in implementing new practices. However, the epistemological and ontological tensions were important to surface in this thesis. Surfacing them helps us to understand why there are conflicting conceptualizations of learning throughout the history of American education, and illustrates why educational thinkers become mythologized and their theories subconsciously blurred. A further development of these tensions is beyond the scope of this research.

Attempting to untangle the ideas behind the different educational movements also revealed that there were overlaps between what was considered progressive and traditional. Tracing these iterations uncovered seemingly incompatible conceptualizations of learning. The main tension in American curriculum design arises from the work of two main educational thinkers from the progressive era: John Dewey and Edward Thorndike. To reiterate Labaree's point on this:

The heart of the tale is the struggle for control of American education in the early Twentieth century between two factions of the movement for progressive education. The administrative progressives won this struggle, and they reconstructed the organization and curriculum of American schools in a form that has lasted to the present day. Meanwhile the other group, the pedagogical progressives, who failed miserably in shaping what we do in schools, did at least succeed in shaping how we talk about schools. Professors in schools of education were caught in the middle of this dispute, and they ended up in an awkwardly compromised position. Their hands were busy—preparing teachers to work within the confines of the educational system established by the administrative progressives, and carrying out research to make this system work more efficiently. But their hearts were with the pedagogues. So they became the high priests of pedagogical progressivism, keeping this faith alive within the halls of the education school, and teaching the words of its credo to new generations of educators (Labaree, 2006, p.276)

As Labaree points out, the struggle for the control of American education emerged during the progressive era. However, closely analyzing the works of Tyler, Taba, and Wiggins and McTighe, it appears that what links them genealogically is not just the theories they build on but a desire to fit Deweyian ideology into Thorndikean practices.

For me this desire has surfaced as a hallmark of American education and a foundation of backward design and constitutes part of a mythologizing process that reshaped the original concept of an objectives-based approach to curriculum and learning in Thorndike's work. In *Society Must Be Defended*, Foucault described how France and Germany each adopted a mythology to link their political history to Rome to defend their form of governance. For Foucault, these mythologies act as a mechanism or "a discourse with a specific function" (Foucault, 2003, p. 116). The continued use of these mythologies throughout French and German history ensured a specific functioning of power. Foucault traces how these two cultural mythologies were shaped, reshaped, appropriated, linked on to other cultures and grew or diminished in power. My genealogy suggests that John Dewey has been mythologized through the work of educational theories – most notably those I refer to above - in American education. It seems that Dewey's work was cited by these educational theorists to perpetuate the belief that objectives-based learning and a procedural form of curriculum making rests on more than just learning by Thorndikean stimulus-response.

Alongside the mythologizing and the creation of *savoirs*, legitimacy and the coming to dominance rested on three subjugated knowledges. These subjugated knowledges relate to the theories of the mental disciplinarians, the application of a standard deviation in educational tests, and the role of schools to be more than just institutions to develop intellect. Over time, a regime of truth became constituted based on the supposed legitimacy of objectives-based learning, outcomes-based learning, and standards-based learning as the

basis for curriculum making, understandings of learning, and assessment of learning. Backward design is part of this regime of truth.

Governmentality and the ‘conduct of conduct’

Through time the *savoirs* that emerged during the progressive movement became linked with different practices, institutions and discourses. Where this linkage became embedded, the *savoirs* strengthened their power and influence over educators. Where the *savoirs* were not linked adequately to practices, institutions and discourses, they receded. This study strove to understand how backwards design became linked to different practices, institutions, and discourses through time by analyzing the works of Tyler, Taba, and Wiggins and McTighe.

Tyler’s work capitalized on the growing state control of educational management and administration that emerged in the 1920s (particularly in urban areas and slowly developing across rural America). Moreover, the development of educational theories contributed to the growth of educational institutions. Powerhouses such as Teacher’s College (at Columbia University) and the University of Chicago were supported by other educational institutions, such as Ohio State and University of North Carolina, where Tyler worked. These power/knowledge structures exercised disciplinary power through their faculty and graduates. Graduates of these institutions would go on to become school principals, curriculum specialists, high level administrators, and government consultants. The Tyler rationale helped legitimize this power/knowledge structure by providing a common language and perspective through which to interpret the various educational theories developed during the Progressive Era. This shaped the conduct of those within the educational system. Since its publication in the 1940s, the Tyler Rationale has continued to conduct the conduct of educators.

With the growing lack of confidence in the implementation of progressive educational practices in school systems post WWII, new fields of power helped Taba legitimize her educational theory. Although her theory for curriculum planning was similar to Tyler’s, she disassociated her theory from the ideas that underpinned and legitimated the Tyler rationale. For example, Thorndike’s theory of learning was significant in shaping Tyler’s argument for objectives-based learning and evaluations. However, Taba minimized this aspect, and instead pulled from field theory, sociology, and anthropology to justify her curriculum model. She also placed a pronounced emphasis on culture and integration. This could be attributed firstly to the landmark supreme court decision in *Brown vs. The Board of Education* establishing that state legislation separating children based on race was unconstitutional, and secondly to the civil rights movement in the 1950s and 1960s. Due to this societal context, the school districts in which Taba worked (NYC and San Francisco)

were interested in having her develop her curriculum model under the assumption that it could help to build social equity. These societal problematics influenced Taba's thinking and practice, and helped to bring a new justification for the use of objectives-based learning.

The 1990s crystallized objectives-based learning in the American curriculum through federal, state, and independent mandates, legislations, and initiatives. The shift from equity to excellence allowed practices of educational objectives and testing to gain renewed significance in light of accountability measures to ensure excellence. Excellence created a field through which educational theories and practices could be realigned and rejustified, allowing curricular theorists like Wiggins and McTighe to rearticulate objectives-based learning in more modern vernacular: backwards design.

How has backwards design shaped my beliefs, attitudes and practice? And is there room for resistance?

Getting clear on the distinction between the fact that our practices are contingent and the history of how these same practices were contingently composed goes a long way toward recognizing the broader import of genealogy. For if genealogy helps us see how our present was made, it also thereby equips us with some of the tools we would need for beginning the labor of remaking our future differently [...] To make those constructions different, to make ourselves otherwise, we need to know, amongst other things, how it was that we made ourselves into who we are. (Koopman, 2013, p. 130).

Through this genealogy I gained a deeper understanding of the different power/knowledge structures that have shaped backwards design and the various networks of power (e.g. ideologies, knowledges, institutions, and theorists) that are potentially activated when I apply backwards design in curriculum making or transmit the knowledge of backward design to colleagues. Backward design made me believe that learning can be controlled. Not only did it make me believe that teachers could control how and what students learned, but if we can control this then students will obtain the skills and knowledge they need to be empowered and free themselves from the social constraints they were born into (in my United States context) or acquire the skills and knowledge to give them a competitive edge in the job market (in my French Business School context.) This genealogy has made me realize how reductive this belief was. My genealogical journey allowed me to see that learning is not a reductive practice. Learning is complex, and the way we should undertake teaching should reflect this complexity. Foucault stated that through genealogies he wanted to

reintegrate a lot of obvious facts of our practices in the historicity of some of these practices and thereby rob them of their evidentiary status, in order

to give them back the mobility that they had and that they should always have (Foucault, 1996, pp. 412-413)

Reintroducing complexities into our conception of learning is how we can retrieve mobility in learning and gain mobility in thought. One way to do this, is by reflecting on the knowledges that were subjugated by the regime of truth.

One such knowledge was the theories of learning by the mental disciplinarians. By uncovering this, I now have a better understanding of why it seemed so difficult for colleagues where I worked in France to come to acceptance of backward design. Mental disciplinarians believed that there was an inherent logic in the study of disciplines that would develop mental processes such as logic and critical thinking. Within this understanding of the disciplines, there was no need to have objectives and outcomes because within the discipline laid the rationale for learning. The rationale of disciplines underpins the *Grandes Ecoles* system in France. Prior to entering a *Grandes Ecoles*, French students complete two years of a *classes préparatoires*. The *classes préparatoires* and *Grandes Ecoles* systems are based on a very academically rigorous studies usually only completed by the social elite.

The *classes préparatoires* is an institution in the French education system, that provides the type of education that was challenged by the progressive movement. For example, curriculum theorists such as Taba and Wiggins and McTighe attempted to disassociate the mental processes involved in learning from the disciplines, claiming (through the use of constructivist learning theories) that sampling content in relation to the mental processes was enough. It was this understanding relating to backward design that had shaped my interaction with professors. When working with them, I would urge them to reduce the amount of material covered in their courses and introduce activities to develop learning. This was often regarded with mistrust and insistence that students must work through the canon of knowledge in that discipline. The fear was that if content was not addressed in their class, then when would the students be confronted with important disciplinary concepts? If the students did not learn these, then what would they have learned?

The regime of truth that dominates the French *Grandes Ecoles* system seems to resemble what, in the United States, is called mental disciplinarianism. As the new regime of truth that has come to dominate American education – backward design - impinges upon that of the French system, these two regimes resoundingly clash. Not fully realizing this clash I did not understand why shifting towards a backwards design model was so difficult for my French colleagues. Furthermore, with a better understanding of mental disciplinarianism, I have a better appreciation of the learning methods and academic values

that shape the French *Grandes Ecoles* system and, by extension, shapes the understandings of the professors and students within that system.

Considering resistance

As theorists such as Taba and Wiggins and McTighe have shown, even if an educator wants to place emphasis on learning and understanding, integration of backwards design into that process limits the possibility of learning. Rather than an individual having a unique, personal and fulfilling relationship with their learning, as understood by backward design, learning becomes externalized into objectives or outcomes that are then used for reasons other than building knowledge and obtaining fulfilment for the individual. This genealogy also helped me to question what objectives are obtained through backward design. Could this way of learning really be the means to end educational inequality as Taba seemed to suggest? Is this way of learning the key to lifting American education to higher standards so that we have a competitive edge in the global market? Or perhaps, as Altbach (1995) and Bestor (1956) suggested, education is just the smokescreen to hide other socio-political failings. If they are correct, does continued use of backward design make us complicit in hiding these failures, or even worse, does it make us complicit in propping up the system that has contributed to these failures?

If we decide the answer to the question of complicity is yes, is there a way to move outside of the regime of truth of outcomes-based learning, standards and assessments, and backward design? I think there is. Foucault writes that power

is exercised only over free subjects, and only insofar as they are free. By this we mean individual or collective subjects who are faced with a field of possibilities in which several ways of behaving, several reactions and diverse compartments may be realized. (Foucault, 1982, p. 790)

Through the subjugated knowledges I noted above, we can see alternative ways to be and thus can posit alternative ways of being.

The subjugated knowledge of assessments based on standard deviations has helped me to start thinking about assessments in a different way. Although assessments based on standard deviations may not be the best alternative, it is an alternative that is still in use, leaving a possibility to break from the objectives/assessment format. When I first started teaching in France, I was asked to redistribute the grades of the class using a standard deviation for every assessment I undertook with students. As someone who was trained

within the Tylerian format for objectives and assessment, this form of grading seemed counterintuitive to “good” teaching practices. Why would students be given an assignment where specific objectives could not be reached? Uncovering this knowledge not only helped me understand the justification for this approach to grading in the French system but allowed me to conceive of assessments in a different way outside of the objectives/assessment episteme. Through a Tylerian assessment, a teacher essentially filters out from the subject what needs to be learned and how it should be learned by the student. It does not allow the student to engage with the material in their own terms. However, uncovering assessments based on standard deviation shifted my thinking about assessing students in relation to the knowledge of the subject. Assessing outside of performance objectives allows teachers to create assessments to understand how students are working through the knowledge that is presented to them, which parts of it they are acquiring, and the ways that they are interpreting this knowledge. Reflecting about assessments and their purpose leads me to reflect on the purpose of learning and education in general.

The final subjugated knowledge is perhaps the most provocative. In tracing the different iterations of backward design, we see how the iterations are reworked in the contexts of addressing social, economic, and/or political problems of that time. However, as Bestor (1956) points out, perhaps the school is not the best place to solve these problems. This is not so much a case of resistance, but of questioning the “truth” of education being best suited to addressing social, economic and political issues. The episteme of “excellence” continues to task education with solving social, economic, and political issues. Teachers, like myself, are brought into this system thinking that this is possible. When problems in society continue to exist, education is blamed, then the system blames teachers, but perhaps the real blame should be placed on the impossible task that is asked of education.

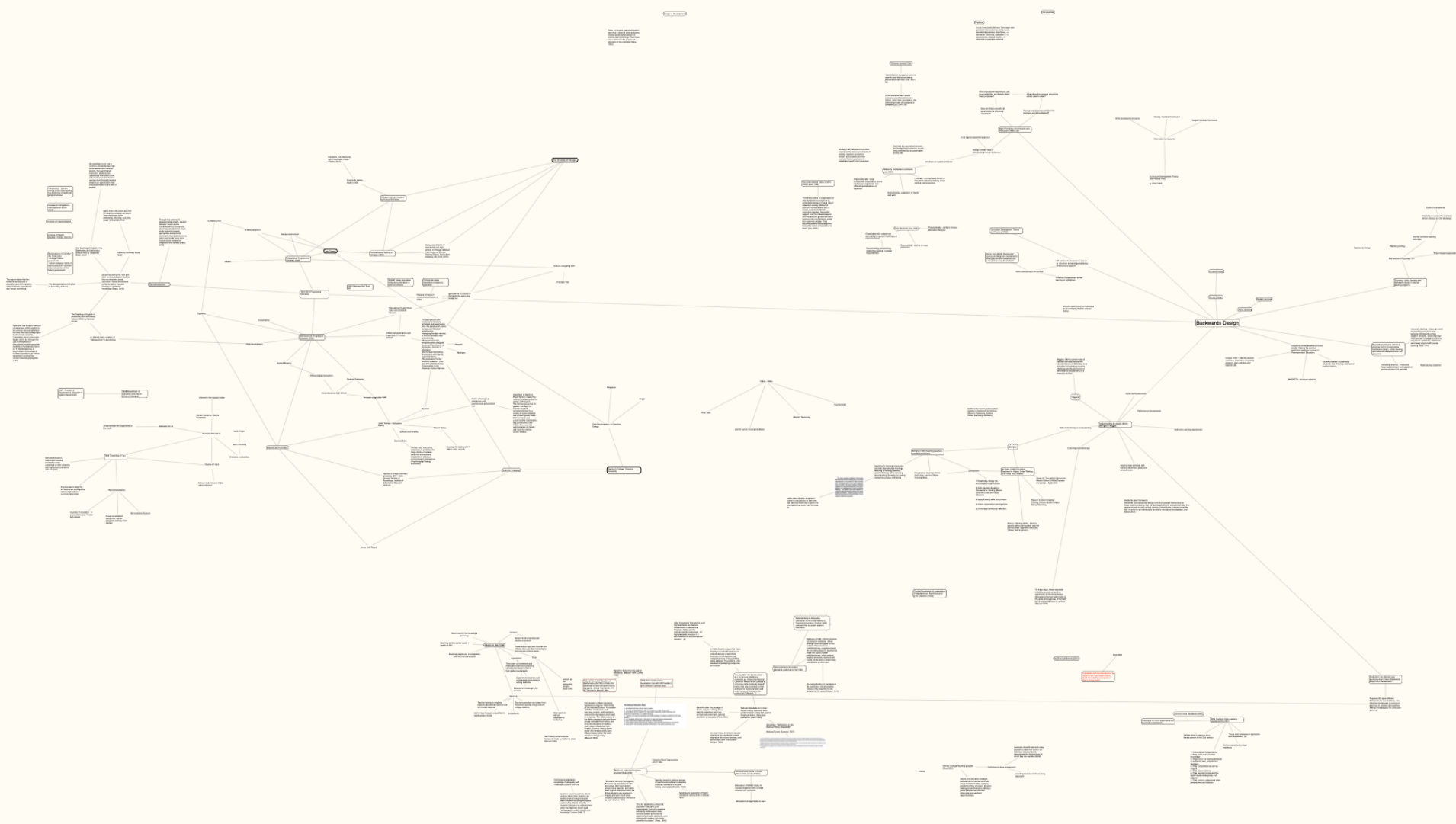
As I conclude this genealogy, I am transitioning from my career in the French Higher Education system to restarting a career in education in the United States. It is perhaps at this juncture, particularly when thinking about the possibility of becoming a teacher in the public education system, that resistance is hardest to see. The French resistance to objectives-based learning came from their historical, cultural, and theoretical understandings and conceptions of learning. These conceptions of learning clashed with the American objectives-based learning theories. The French practices that emerged from this different history provide alternatives to objectives-based learning. Contrarily, in the United States, alternatives to objectives-based learning have been buried by the objectives-based regime of truth. Educators who may not agree with the process of objectives-based learning, do not have

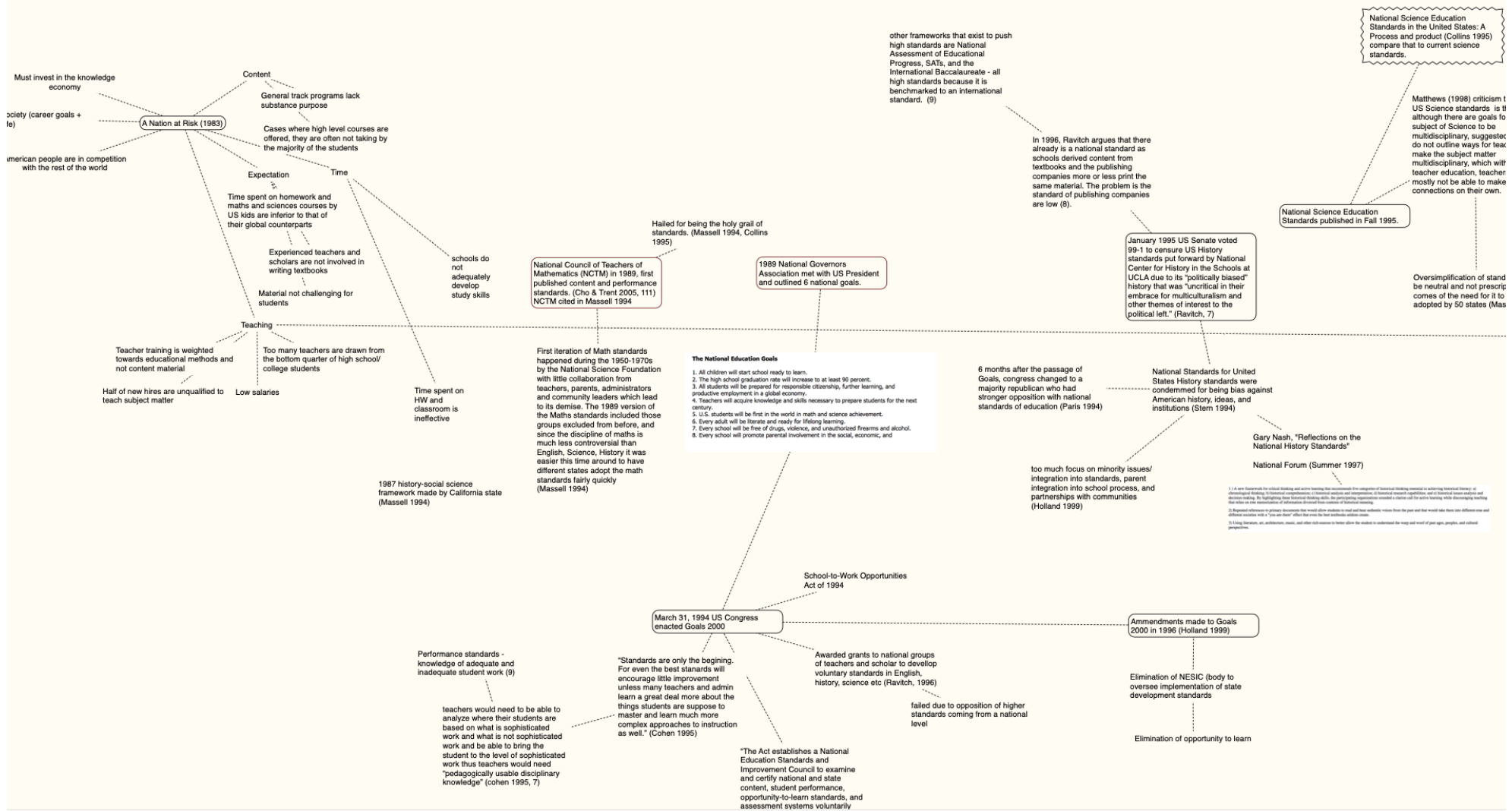
easily accessible alternative chains of power to activate. This could be due to not having readily available practices and articulable conceptions of alternative ways. Additionally, educators who do have the knowledge and awareness of alternative practices, are not able to link with chains of powers because the regime of truth is so strong that alternative chains are broken and fragile. As the discourse of objectives-based learning continues to emerge and spread in France and other education systems abroad, it is interesting to observe which local chains of power objectives-based learning will link with to strengthen its regime of truth, and which local chains of power are strong enough to keep the objectives-based learning regime at bay.

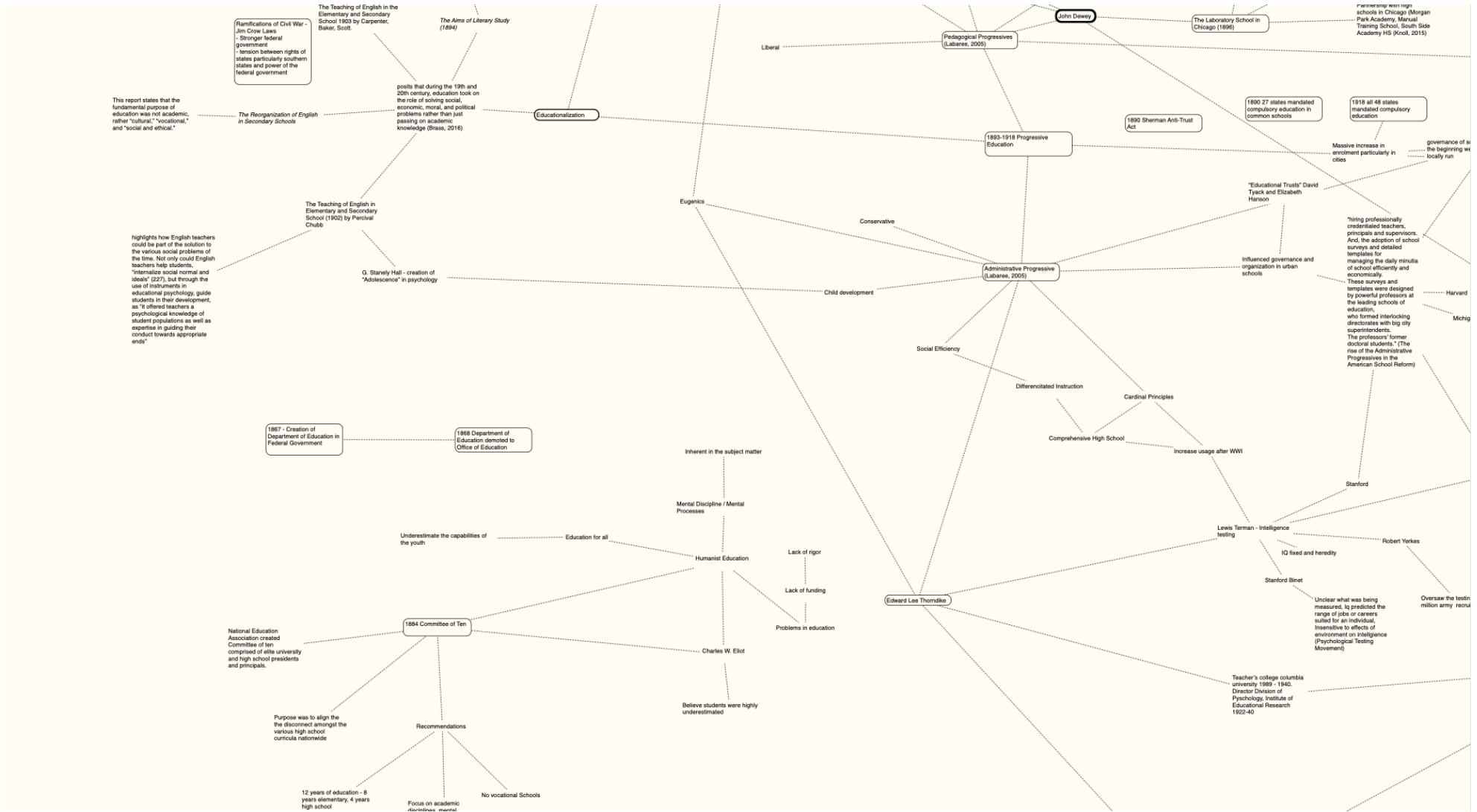
Tracing the works of educational theorists, underlined for me the undervalued role of teachers. Not only were educational theories often developed outside the realm of practicing teachers, but they were also often asked to *apply* these theories, particularly those relating to an objectives-based approach to curriculum and learning. If we do not teach prospective teachers about the history of these approaches, it makes it difficult to articulate the reasons why objectives-based learning has become dominant, or that this approach may sit at odds with other ways to think about teaching and learning.

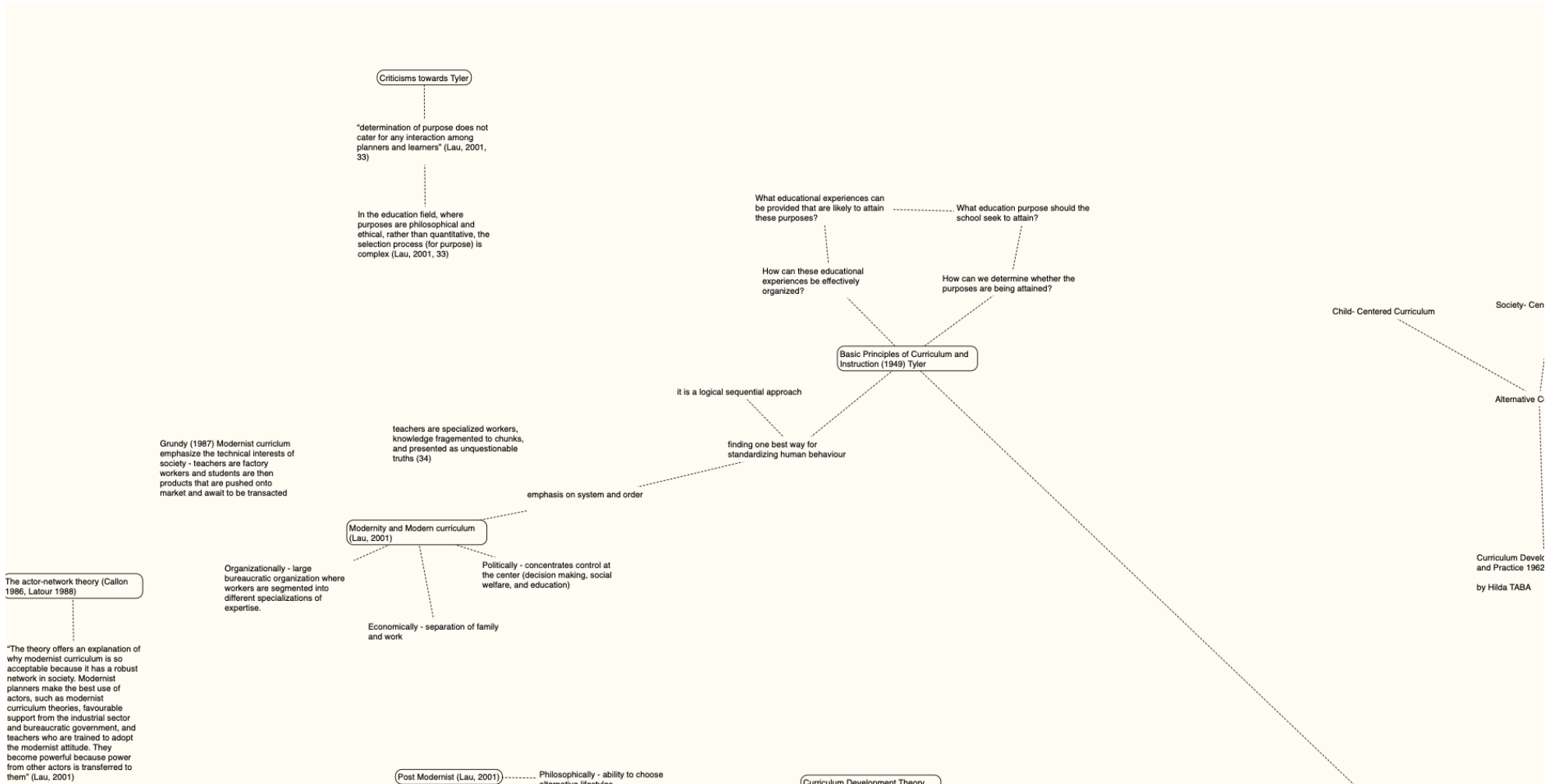
Prior to this genealogy, I interpreted my hesitance in applying backward design or advising on the use of other learning methods and theories to a lack of knowledge or confidence in my knowledge about the method. Now I interpret my (continued) hesitance, as a form of resistance. Koopman writes: “Freedom, we may find, is most transformative when it is humble and hesitant, exploratory and experimental” (Koopman, 2013, p. 174). As someone who is now more knowledgeable about educational theory and practice, I wish to shift from someone who advises on *what* applications of theory should be applied to practice, to someone who helps articulate *why* theories and practices of learning might be used and what alternatives might exist. I will work towards becoming this person in the next phase of my career, but for now I am humbled by my genealogy. I will tread carefully and continue to reflect on how my actions function within networks of power.

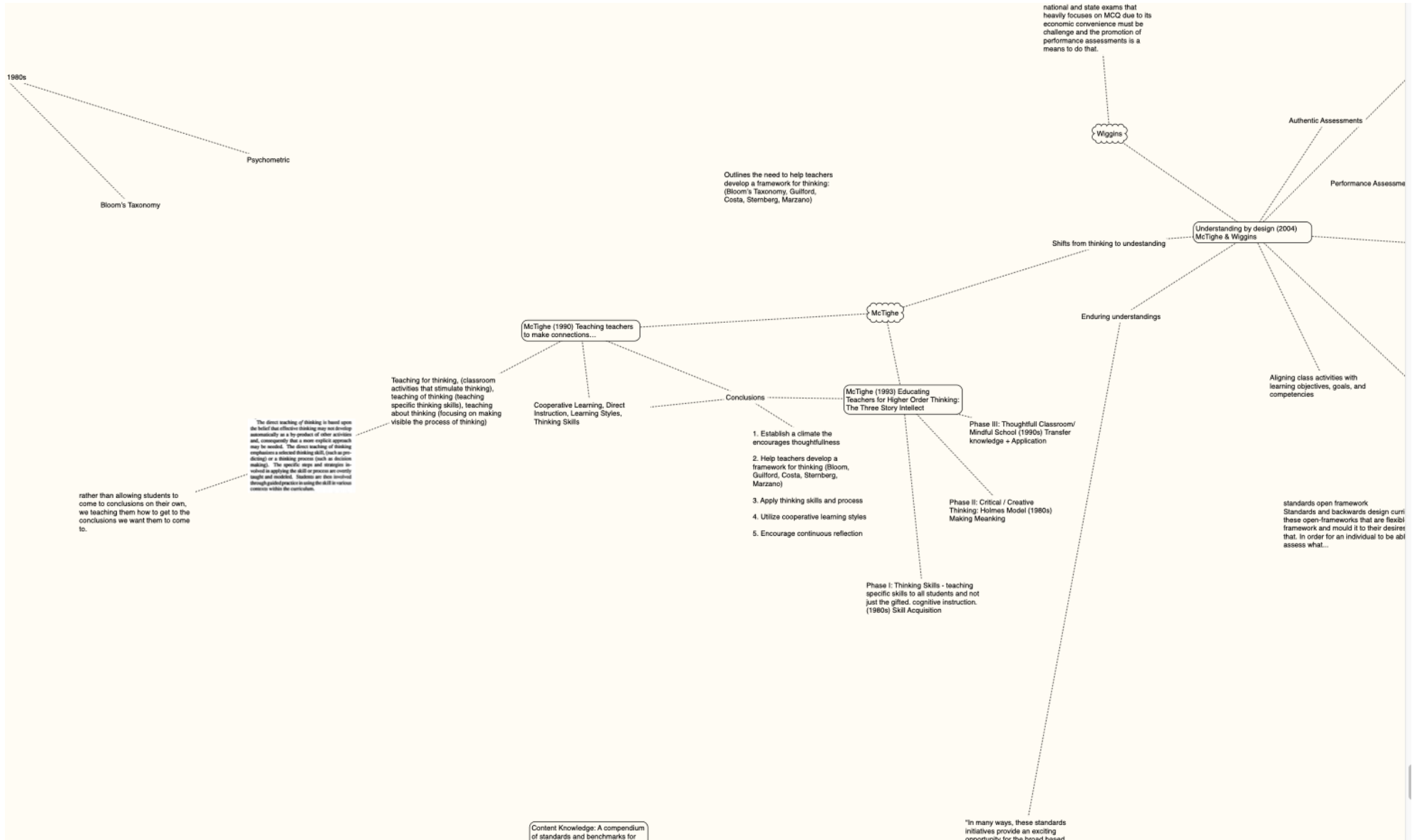
Appendices: Genealogical Maps











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