An Examination of Graphic Design Skills Gaps Academia vs. Real World Needs
An Examination of Graphic Design Skills Gaps: Academia vs. Real World Needs

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Identifying and solving for the gap between university curriculum and the expectations of workplace hiring managers leaves graduates at a disadvantage when seeking employment in their field. What are those demands? What are the skills gaps?

How can we solve to properly prepare graduates so that they are well-prepared for the demands of the industry?

I found more and more published research into the problem existing, for one article as far back as 1994. This really hits close to home for me, because that was around the time I graduated with my BFA, and was working to find a job in the field myself. The sad part is that this research has been worked-on, over and over again. The problems identified, albeit from different angles - which is great - but the heartbreaking part is that over the last 25 years, not much as changed. Overall, the education gap still exists. I was frustrated with the shortcomings in my undergraduate work and wanted to make a difference. It did not live up to the cost and time spent pursuing.

This body of research has also sparked ideas as to how to solve for it. Looking at projects that obviously identified the problems, and to some degree worked to also solve the gap. An additional article, and some life experience injected through my son’s ongoing school at the present, identifies cooperative education experiences as helping to bridge this gap. My son is an engineering student at the former General Motors institute in Flint Michigan. There, he is in a classroom setting for 3 months, then spends 3 months working with an auto-maker; rinse and repeat over the span of 5-6 years. When he graduates, he will have 2-3 years of solid work experience gaining skills that aren’t taught in a classroom environment by those working the field. This is invaluable, but how practical is that for all job types? Specifically speaking, is that practical here for graphic designers? Or is there some other method? In short, I think so.

My Conclusion:
Again, more proof that the problem exists. This round of research reaches back to 1994 where we are not seeing this as a trend as of late, this is an ongoing problem that has not been effectively solved over the span of nearly 30 years. Seeing that this was even an issue that the Bauhaus movement was looking to solve, to some degree, dates it back much further.
The problem is, and always has been: Identify the gap between paid traditional education programs and the actual market for Graphic Design. Then, look at ways to solve that problem in a way that benefits the job seeker - the pupil of design.

Through my research, so far, I have identified some research gaps. Those gaps would best be filled, in my opinion, through some direct participation in surveys of existing programs. Meaning, I had envisioned seeking out 1-3 design programs active in both a community college (certificate) as well as undergrad 4-year programs and working to identify the goals to which they dedicate the programs (their marks of success).

I also would have very much liked to have pooled hiring managers across a diverse set of "graphic design" fields, whether that be agency, digital design, print and publishing, as well as new media (app/games/web) to see what their indicators for hiring were. Then match the two.

Through readings in "Made to Stick", I realized I also needed an engaging story. One that I could tell with detail, one that was real. And through this exploration, I found one. My own story highlights the problem, and the need for a solution.

In 1995, I found myself about to graduate from a design program. My VA benefits had been exhausted, my degree in advertising design and advertising illustration had been completed. Now, it was time to go get that job I was convinced I had been thoroughly prepared for. Or so I thought.

Interview after interview, I heard the same things. "Do you know how to use this technology to accomplish what your portfolio shows in terms of manual production of art and illustration...?" I could not answer with anything but "no".

I felt cheated, and often used the description that if my degree had been even a sandwich, I would be standing in line to return it as wrongly prepared, faulty, not fit for consumption. Though, with a degree, this is what I had with no real recourse but to suck it up. And that I did, through a bit of negotiation, I ended up securing my first job at a small advertising agency by offering to learn the skills necessary, on my own time, without pay, to prove myself.

Fast forward a bit, and here I am: 49 years old, successful design career and working to complete my MFA. I’ve also served in a hiring capacity for many years. It struck me, pretty hard actually, that even now, 25 years later, I am still seeing a gap in what recent graduates bring to the table and what I expected to see as the hiring manager. I’m now sitting on the opposite side of the table, and I see the problem from a different angle. It has made me angry, frustrated, and sad for the graduates that still find themselves in the same situation as I found myself 25 years ago.

For me, that is the gap, but with the research, and some first-hand knowledge, I feel that gap can be easily overcome.

Back to the research, the gap, and how to solve: I may be getting ahead of myself, but I also have approached this with the mindset of “begin with the end in mind”. Meaning, I have identified some other skills that would help with securing a job. Things that are not taught, that are valuable and seem to only be learned on the job. Things like interviewing, portfolio prep, resume building, negotiating, photo shoot organization and planning, running a shoot, dealing with talent, and the list goes on.

With regard to direct research, I believe that filling the research gap, at this time, could easily be found through some further digging and researching the subject. There appears to be plenty of information available concerning this subject, it just seems there have been ineffective solutions proposed that never resulted in change.

I really believe I have a solution in the works that can help solve these issues, put more power in the hands of the graduate, increase their compensation, and bring value to the community overall. It’s scalable and applicable to other fields of study.
A research statement is a short document that provides a brief history of your past research experience, the current state of your research, and the future work you intend to complete. The research statement is a common component of a potential candidate’s application for post-undergraduate study.

At first, I was coming up empty-handed on research due to using the wrong terms. However, once I was able to find a couple of articles, I realized there were some common terms being used and descriptions of the underlying problem were worded slightly different. Once this was figured out, it is somewhat overwhelming in terms of the amount of information available.

Probably the most shocking realization was that there seems to be a fair amount of thesis written about different parts of the same problem, and some are quite old. That being said, the problem still exists despite finding research describing the problem from the industry point of view as well as academic. So, why is there not a solution?

We can actually look back to at least the Bauhaus movement to see this was already being identified, and worked-on, yet somehow we are failing to meet the needs of the industry through academic programs many years later. Why is that? That is what I aim to tackle in this thesis - as well as devise a proposed solution.

Past Research
I have uncovered a good bit of research, of which I have not been able to read in its entirety. However, as an overview, it all appears to validate the notion that there is a skills gap. The expectation of employers is not being met by graduating students. Graduating students are not having their job-getting expectations fulfilled through their job searches after college.
Current State of Research
Where I am now, I feel I have a good collection of research that isn’t 100% read and noted just yet. Once I really got on the right path, I fell into a trove of great information that needs noted, read and pulled together as notes. This work continues daily and at times, is nearly consuming. Not overwhelming, just interesting and energizing. I would love to be a part of the solution to this problem. The idea of being “that person” is what drives me.

In Summary, the current research reinforces my general thoughts.

Future Research
I feel the value lies in collecting the data into a defined set of skills that today’s designer should be armed with, when graduating college. I think equally important are skills that are not inherit to just designers, but functional business skills that only seem to be learned through experience on the job, which equates to trial and error. These skills might be things like; how to run a meeting, how to organize a photo shoot, how to create a shot book, how to meet with clients (necessary for both internal and external client dealings), how to organize work, and how to collect, process and tolerate changes and alterations to projects. These are all things that have always been missing from most programs.

In addition, I want to research more into what has been proposed, what action was taken, and why it didn’t work or wasn’t well-received. I think that would be very important to figure out before working toward a solution that, perhaps, had already proven as a failure.
What Are The Base Skills For a Graphic Designer?

This is the core of the issue, I believe. And, from the research, there appears to be a collective agreement. Academia is seeing one set of skills while the market demands another. All the while, we are just discussing meeting the baseline for minimum qualifications here. For me, the issue shouldn’t be meeting the minimum. It should be providing a quality product. If it were just a sandwich would we be happy with the minimum?

For the sake of comparison, the sandwich is great. Pair it with some fries and a drink, to meet the minimum standard. We drive away, shrug our shoulders, and hope it doesn’t send our digestive system into turmoil 20 minutes down the road. Is this what we want to say about our educational experience? We’re comparing a $7 meal with a $40,000, four-year endeavor. I can tell you that I had much higher hopes than “meeting the minimum standards” just for the time spent, let alone the expense involved. We can do better, and we owe the next generation better. Why we aren’t seeing an upheaval as a result, I do not know.

This excerpt from “Teaching the Designer of Now: A New Basis for Graphic and Communication Design Education” by Juliette Cezzar is a great introduction to the problem:

"Between 1950, when the first graphic design program in the United States was established, and the late 80s and early 90s, when computers appeared in design studios, the literature describes graphic design education as moving away from commercial advertising and illustration towards a more conceptual, integrative practice. Since the early 1990s, however, there has been an increasing atmosphere of alarm surrounding the mismatch between what design education provides and what future job requirements will be. Nowhere is this incongruence more evident than in the field of graphic and communication design, which has vigorously debated its boundaries, histories, and even its name. That ambivalence only serves to further complicate the establishment of an educational vision. In these last thirty years, the field has been described as too new to be a coherent and distinct discipline with its own methods and history, while education within the field has been routinely deemed obsolete.” (Cezzar, 2020)
The research shows evidence from numerous sources, from professional pubs, to studies to historical repeat offenders. This problem isn’t new, but we do owe the industry, the profession we love, and those that would follow our footsteps, something much better.

The necessary skills seem to be the disconnect. Academia is teaching from one set, and the market demanding another.

What skills are being taught in higher education programs? Are these skills the right skills? Is it purely tech-driven?

Where lies the problem?

Another lens through which to view this issue is that of expectations. I have often chalked much of life’s disappointments up to high expectations. This very subject is covered in the short piece from “Creative Review”:

“Doyle says that studios often have unreasonably high expectations for graduate designers, with students reporting that first time roles demand more skills than they can reasonably be expected to have. While Doyle is talking about the situation in Australia, it’s undoubtedly a problem that affects the creative industry across the board, and hovering over all of it is a bigger question – are universities doing enough to prepare students for real life jobs?” (Tucker 2019).

Are we, as an industry, expecting too much from new graduates? Or is there really a gap? I think to ensure that we are on-track with identifying a problem that truly exists, it’s good to step back and make sure that we aren’t just misaligned in this respect.

As I read on, through the multiple studies and pieces that I have located, a resounding “no” rang out. More and more information resulted in an overwhelming view that there is a misalignment embedded into what is seen as valuable in terms of curriculum vs. what is seen as needed by the marketplace of employers as a whole. I believe this is accurate.

The Relationship Between Higher Ed and Industry:
The relationship of higher education and the business industry has long been in existence in all disciplines, though that relationship has been complicated (Latham, 2012). Many agree that business leaders have been instrumental in education on many levels, including providing internships, providing educational programs, teaching courses, and providing financial support. Conversely, higher education has provided the industry with professional training of employees as well as basic and applied research. However, both sectors agree that many students are entering the workforce ill-prepared and lacking adequate knowledge and skills to be productive in the industry. The underachievement of students in the workforce has created a shaky relationship among educators and industry leaders (Lapin, 1982).

“This moment also marks an opportunity to break away from industrial age attitudes that attempt to align curriculum with desired job skills proportional to labor forecasts.”

(Cezzar, 2020)
Is the problem rooted in faulty courses of study? Are the employer's needs and wants just too great? Do the instructors have the right experience? I've heard and seen some evidence that suggests there is a gap between the experience of the leaders in academia and the market. Could this be made better through leaders with more industry and market experience? Should there be more of a connection between academic programs and market leaders in the form of advisory committees? Could it be, like books, where the content is somewhat outdated before it ever hits the shelf?

The results from research within the Bridges documents were that the necessary skills identified by her research comparison (Wang 2006) were nearly identical to that of her survey results 7 years later in 2013. How could such a skills gap continue to be an issue without some sort of resolution being sought and implemented?

Again, the research strongly suggests a mismatch between the preparations that most college programs provide and the needs of the market.

From what I feel is a unique perspective, I am seeing the problem first-hand, which is what drove me to use this as my thesis subject. I felt the sting of being ill-prepared in the mid-1990s, and I am sad to still see that be the case for many of the new graduates that I have interviewed over the years.

From what I have read, the debate seems to lie in identifying the common skills necessary to be productive in the market, as identified by industry. And then comparing, and aligning that to the coursework of academia.

Other questions I have pondered through the course of this research project:
- Would academia be better served through programs where professors were full-time in the industry and part-time instructors?
- Would co-op education programs better prepare students for work life?
To restructure the entire education systems would be a lofty endeavor. It would take a massive shift in thinking and large collective undertaking.

The introductory statement from “WHAT MAKES AN UNDERGRADUATE GRAPHIC DESIGN EDUCATION VALUABLE?” brings this entire thought process to a great point of contemplation - and really just a great summary of needs:

“Formal design education plays an important role to prepare students to begin their careers in professional design practice (Davis, 2005; Frascara, 1998; Wilson, 2014). Students develop specific skills to professionally acceptable levels at university and in return, they will be hired based on their skills in creating visually appealing designs after they graduate. It is believed that they will be able to survive in the industry if they manage to use these skills creatively and effectively to help a business or product to stand out from the crowd (Muratovski, 2016). However, as Heller (2015) wrote, “...[graphic] design education has a lofty status now... it is no longer adequate to simply [train the graduates to] have a marketable portfolio... They [graduates] must have certificates, diplomas, degrees, awards, and scads more evidence that they are designers with a capital D rather than mere mouse-pushers” (p. 11-12). In other words, graphic design graduates must demonstrate additional competencies to enhance their employability and secure positions in industry (Adu, 2015).”

In order to be able to train the designers of the future, we must first meet those needs of the market and then continue to grow those programs to properly prepare students for the workplace.

I’ll end this portion with a parting thought from another great article on the subject.

“Adopting real-time job data for examining the labor market will help academics keep their finger on the pulse of the expanding industry. After identifying which skills employers are calling for, we must align our curriculum to connect knowledge with competitive jobs. This intentional preparation of students builds in-demand design programs with high growth potential that ready graduates for their future.”

(Miller, 2020)
Identifying and solving for the gap between university curriculum and the expectations of workplace hiring managers leaves graduates at a disadvantage when seeking employment in their field. What are those demands? What are the skills gaps? How can we solve to properly prepare graduates so that they are well-prepared for the demands of the industry?

I found more and more published research into the problem existing, for one article as far back as 1994. This really hits close to home for me, because that was around the time I graduated with my BFA, and was working to find a job in the field myself.

The sad part is that this research has been worked-on, over and over again. The problems identified, albeit from different angles - which is great - but the heartbreaking part is that over the last 25 years, not much as changed. Overall, the education gap still exists. I was frustrated with the shortcomings in my undergraduate work and wanted to make a difference. I had to work unnecessarily at learning skills that would have helped me secure my first job after graduation.

This body of research has also sparked ideas that I can use to solve the problem. I have seen projects that obviously identified the problems, and to some degree, worked to solve the gap.

An additional article, and some life experience injected through my son's ongoing school at the present identifies cooperative education experiences as helping to bridge this gap. My son is an engineering student at the former General Motors institute in Flint Michigan. There, he is in a classroom setting for 3 months, then spends 3 months working with an auto-maker repeating the cycle over the span of 5-6 years. When he graduates, he will have 2-3 years of solid work experience, gaining skills that aren't taught in a classroom environment by those working the field.

This is invaluable, but how practical is that for all job types? Is this practical for graphic designers? Or is there some other method?

Conclusion: Again, more proof that the problem exists. This round of research reaches back to 1994 where we are not seeing this as a trend as of late, this is an ongoing problem that has not been effectively solved over the span of nearly 30 years. Seeing that this was even an issue that the Bauhaus movement was looking to solve, to some degree, dates it back much further.
The Student & Job-Seeker:
I’ll start with the most important stakeholder in this entire equation, the student. The student is the one paying for an education and typically receives less than they had hoped, or unknowingly (or perhaps knowingly) gets short-changed in this transaction but don’t really have a means to change the situation.

How so? The student normally prepares through a 4-year education at an institution of higher education expecting that they are well-prepared to meet the demands of the job market. As a result, they should be able to secure employment for valuable compensation that allows them to not only realize satisfaction in their chosen field of design, but also enables them to repay the debt they have incurred to the institution at which they trained and studied for the last 4-5 years. However, many (including myself) found that to not be true.

If this problem were to be solved, the solution would enable new graduates to secure gainful employment, negotiate higher salaries and contribute more effectively to the market and their employer’s P&L.

The Industry:
Now that I have sat on both sides of this fence, I can see the frustration associated with reviewing portfolios of recent graduates and not seeing the type of work or skills necessary to enable me to hire them. I also see that some skills remain untaught, even after being out of school myself after nearly 30 years. The research also demonstrates that there is skills gap. This gap is hurting the industry and students of the trade by launching them into the market ill-prepared. Companies in the market, if this problem is corrected, would be able to hire from a more qualified pool of applicants and likely be willing to take the chance required to hire a recent graduate. And, with proper skills demonstrated, these new hires would be able to contribute to the bottom line on day one.

Academia, in General:
Here is where it gets a little “sticky”. Why? Because I may step on a few “academic toes”. The research tends to suggest the gap lies in what students are taught vs. what the industry needs. Is this due to a separation between the market and academia? I think the research strongly suggests this. Is traditional academia prepared to train the students? Is it a problem with course of study? We aim to find all of this out, and more. I aim to solve it.

What is at stake for academia? There is good and bad here. I believe it could shine a light on a disconnect that, at least in the short term, identifies shortcomings. Though, if the problem and solution are embraced from the perspective of helping produce a better end product (prepared graduates), doesn’t everyone win in that scenario? Aren’t we only as good as the product we produce? Are we, as academia, willing to identify weakness and correct it to make a better end product?

Time will tell, however, there are actually at least two solutions to the problem, as I intend to identify and use one avenue as a solution.

I think the inherited risk here is that if a solution cannot be embraced, and soon, academia risks losing credibility as the source of preparation for designers of the future as these skills gaps continue to widen over time.
As discussed before, the research implications of this project could (and should) drastically change established programs of study in the field of graphic design. Or, at a minimum, prescribe a method for altering the path between graduation from existing programs and entering the workforce. Call it an intervention of sorts.

The results, I believe, have great impact on how academia approaches the value of education across its design programs. Are they meeting the needs of the market? If there is a gap, that needs communicated to institutions across the board. However, this may be a bit like making a sharp turn with a cruise ship. Large organizations are slow to react to change. AND, this assumes they are willing to listen to the findings of the research.

I also found interesting articles that claimed this could be the downfall of traditional education programs. Meaning, they are unwilling or unable to meet the changing demands of not only the design industry, but others (generally). Some have proposed that this could usher in a growing certificate type program, or even push students into programs that are contrary to the current choices that tend to be aimed at 4-year degree programs. It gives way to more specialized programs that are closer to market leaders and demands, and perhaps even driven by them.

One of the main reasons my son made his decision to study with Kettering University in Flint, MI was because the education offered something nobody laid claim to. That claim was that after his 5-year mechanical engineering program ended, he would have up to 2.5 years of on-the-job experience. Their program offers 90 days of in-class instruction, followed by 90 days of working on the job with an auto-maker. This rotation continues for the entire 5-year program. In addition, the students are paid (some, quite well) for their co-op employment time.

Not only do they come out with industry experience, they also reduce the debt they carry through working with and for the program. Many end up not looking for jobs after school, they go to work for their co-op companies, or the offers come to them. Why? The market knows they are trained, they have experience and they can provide value to the organization from day one.

Why has traditional undergraduate education not responded to this obvious success? It takes a tremendous amount of work, for one. And, I tend to believe there are other ways to solve the problem. Though it may not occur in the traditional way of altering the education programs themselves, it does alter the path from education to workforce.
My methodological approach would be more qualitative data analysis. This would be done, primarily through data collected by others, for the purposes of this project as well as the fact that so much quality data already exists. There are at least 30 years of work analyzing the same problem.

The method of analysis would be more focused on present day, as recent and relevant as possible, the main reason being that skills have changed over time. Today’s designers are tasked with different types of design projects than even 5 years ago. I think it is important to explore the history of the issue and why it has not been resolved? What has stopped change from taking place?

An unexpected finding was that this is not an American problem. This isn’t even a North American problem. This is a worldwide issue that spans geographical, language, and religious differences. Why such commonality...? What has been tried before?

I will be looking at the research as it pertains to:
- Required Skills (from the market)
- Educational Programs
- Differences between the two
- Historical solutions - what has failed, and what has worked?
- Why is there a difference between educational programs and the market?
- Proposed solutions for solving the problem now

I am planning additional research to uncover necessary skills found inside the latest job postings. I will focus on entry level openings across a variety of industries.

I would very much have liked to conduct studies of my own to address the question head-on, with my own hands-on research. For the purposes of this project, that is not feasible in terms of time. Though, I may continue down that path after this class to work towards concrete solutions.

Initially, I had planned to establish creative assets for a company that would be offering this solution as a service. This still may become a direction I travel with this research in mind, however the final project has transformed into something a little different.

The goal has always been to bring about change. I decided to adjust my focus and work with the idea that the change could come about, if even in a small way, in academia.

Therefore, I chose to construct a guided curriculum plan that addresses the skills found in the research. This curriculum will guide students through 4 main focus areas of graphic design to ensure the student graduates with the skills necessary to gain employment and also ensures the institution provides the required teaching to reinforce those skills.
Introduction

Identifying and solving for the gap between university curriculum and the expectations of workplace hiring managers leaves graduates at a disadvantage when seeking employment in their field. What are those demands? What are the skills gaps? How can we solve to properly prepare graduates so that they are well-prepared for the demands of the industry?

I found more and more published research into the problem, dating as far back as 1994. This really hits close to home for me, because that was around the time I graduated with my BFA, and was working to find a job in the field myself.

Probably the most shocking realization was that there seems to be a fair amount of thesis written about different parts of the same problem, and some are quite old.

That being said, the problem still exists despite finding research describing the problem from the industry point of view as well as academic. So, why is there not a solution?

We can actually look back to at least the Bauhaus movement to see this was already being identified, and examined, yet somehow we are failing to meet the needs of the industry through academic programs many years later. Why is that? That is what I aim to tackle in this thesis - as well as devise a proposed solution.
The Research Rationale

Direct Research Would Be Good, But Perhaps Unnecessary

Past Research
I have uncovered a good bit of research, of which I have not been able to read in its entirety. However, as an overview, it all appears to validate the notion that there is a skills gap. The expectation of employers is not being met by graduating students. Graduating students are not having their expectations fulfilled through their job searches after college.

Current State of Research
I fell into a trove of great information that needs noted, read and pulled together as notes. This work continues daily and at times, is nearly consuming. Not overwhelming, just interesting and energizing. I would love to be a part of the solution to this problem. That idea that I can be the source of change is what drives me. This current research reinforces my general thoughts.

My Research
I have been researching job postings, that contain the information about what the market desires or demands. I chose graphic designer, graphic arts and similar titles. I also made it a point to exclude anything that was not marked as “entry level”.

I then started arranging my data into columns, each one representing a skill that was called for within the job posting. Along with that, I also set-up columns for software packages that were mentioned by name.

It was really interesting as some trends emerged immediately, which were a pretty wide set. It ranged from video production to package design, eComm and everything in between.

Then, the hard part, I diagnosed the courses offered at a small collection of universities to analyze what they actually teach.

Again, I had to make some assumptions along the way, with the biggest one being that undergraduate degree programs were indeed training students for jobs in that particular field. It became interesting to start questioning much of everything, and not making assumptions. When you do that, I think it allows a person to mentally back-up, and look at a problem from an alternate perspective and take nothing for granted.
I Chose Both Secondary and Qualitative Research

My methodological approach has been both qualitative data analysis and secondary research. The qualitative research, primarily through data collected by others as, for the purposes of this project, is in the best interest of time, as well as the fact that so much quality data already exists. There are at least 30 years worth of works analyzing the same problem.

The method of analysis would be more focused on present day, as recent and relevant as possible for the main reason being that skills have changed over time. Current day designers are tasked with different types of design projects than even 5 years ago. Though, I think it is important to show the history of the issue not being resolved as well as perhaps why? What has stopped change from taking place?

An unexpected finding was that this is not an American problem. This isn’t even a North American problem. This is a worldwide issue that spans geographical, language, and religious differences. Why such commonality...? What are other countries doing, or have tried to do?

I will be looking at the research as it pertains to:
- Required Skills (from the market)
- Educational Programs
- Differences between the two
- Historical solutions - what has failed, and what has worked?
- Why the difference between educational programs and the market?
- Proposed solutions for solving the problem now.

There may be some additional research done to uncover latest job postings across several job boards to uncover required skill sets across a variety of entry level design openings, and across a variety of industries.

The main method of research was conducted by cataloging job postings for entry level graphic design jobs, and collecting the skills required for each. I did this for 100 jobs posted on LinkedIn. I collected data from postings that were marked entry level, and checked skills into columns of data to get a feel for what is being desired of a recent graduate.

The final visual solution would be to establish the creative and branding for a third-party company that would bridge this gap between the market and higher education.

The company would be the “finishers” of the design world, adding in the final touches to design education that higher-ed has trouble tracking. Brand creation, website and mobile app concepts as well as ad comps for this newly created company would be the target areas. After complete, my aim is to actually build and launch this brand and company into a viable solution that not only aids the design students themselves, but the design industry as a whole by producing better equipped designers that can immediately excel in the markets they choose.

A second portion of the final solution would be to develop a curriculum of my own, drawing from the information found in the skills data.

Some questions that hit me while researching were:

1. Is there clear intent of most universities, that the programs are geared/intended to prepare students for the specific purpose of gaining employment in that chosen field? Or, does the program intend to simply educate...? I wanted to carry with me as few preconceived notions or assumptions as possible.

2. Could this be a guidance issue? Meaning, are there considerable offerings that would/could properly train a designer, and perhaps they are not taking the correct courses to prepare for the job market? Not knowing what the answer might be, I felt it worth considering.
To summarize quickly, the expectations for entry level design jobs are high. The designer of today, and likely tomorrow, needs to be a somewhat of a Swiss Army Knife. Today, they might be designing something for print, tomorrow it may be screens for a mobile app, and next week it’s a website followed by a digital ad campaign. They want people that can design, code, maybe edit some video, and make 30-minute brownies in 20-minutes.

Though I make light of the demands, it’s not so far from the truth. I have been asked to do all of those things (minus the brownies) and more, throughout my career. In one position, I was building brands, producing catalogs, managing photo shoots (on location and in the studio), producing hang tags for clothing, along with various collateral materials - oh, and I also was helping build this fortune 500 company’s first ecommerce site. This was in the late 90s, and the situation continues today.

With a little luck, some experience from being a techno geek and having been interested in the building of the Internet at the time - I was able to meet the demands of the job.

The findings reinforce my thoughts from 25 years ago. Those thoughts are that the designer of any age must be versatile. They must also be well-trained, and in a diverse skill set, be able to adapt and improvise while carrying a good amount of skill in design and use of color.

Some of the skills that were listed include: Social Media, Video Editing, Web, Branding, Illustration, Animation, Presentation of Work, Photography, Image manipulation, Typography, Collaboration, Creative Briefs, Color, Story-telling, Integrated Campaigns, and Package Design. That’s a pretty wide swath of work just to get a foot in the door.

How do we overcome this for the sake of the designers of the future?

The popularity and effectiveness of Social Media shows this breadth of work becomes necessary to engage clients with graphics, photos, animations and even short videos.

There’s a gap in what these companies look for and what most educational programs are delivering. I questioned where the shortcomings were grounded. Was it lack of classes being offered? Was it poor advisement of students in what courses it would take to ensure success? Was it a simple disconnect between what the market expects and what the schools train for? Was I assuming that a four year degree program was indeed training students for jobs? These were all things that I had to work through to ensure I was answering the tough questions, the right questions, so that my end result in the solution would be sound.

In summary, we (as educators) are not meeting the demands of the market. Hiring managers expect more than what students are leaving schools with. How does that get bridged? Where do we go from here?

I’ve come up with a few ideas. Some, already visited in the past and not so easy to implement.
Summary of Findings

Identifying and solving for the gap between university curriculum and the expectations of workplace hiring managers leaves graduates at a disadvantage when seeking employment in their field. What are those demands? What are the skills gaps?

How can we solve to properly prepare graduates so that they are well-prepared for the demands of the industry?

I continued to fine publish research into this same problem - and it dated back to 1994, and some even further. That date of 1994 means a lot to me, as it is the same timeframe that I found myself finishing my BFA, and working to find a job myself. Discovering that the research has been done before, more than once, was disheartening. Knowing those problems existed then, and continue today left me wondering why? Does it really have to be like this?

This body of research has also sparked ideas as to how to solve for it. Looking at projects that obviously identified the problems, and to some degree worked to also solve the gap.

With my son having a cooperative education/work experience at Kettering University, observations of that experience have helped him bridge these gaps. By giving him the experience of working with an auto-maker half time, while schooling the other half, gives him the benefit of on-the-job training. It doesn't get any more “real world” than that.

With that type of solid real world work experience, he gains skills that cannot be taught in a classroom. That type of interaction occurs in the real world. It’s valuable, but can this be practical for all job types? Can it work here, for Graphic Designers? Or, is there a better way? A different way?

Conclusion: The research reaches back to 1994 where we are not seeing this as a trend as of late, this is an ongoing problem that has not been effectively solved over the span of nearly 30 years. Seeing that this was even an issue that the Bauhaus movement was looking to solve, to some degree, this all dates it back much further.

I was frustrated with the shortcomings in my undergraduate work and wanted to make a difference.

Who Stands to Lose or Gain?

I’ll start with the most important stakeholder in this entire equation, the student. The student is the one paying for an education and typically receives less than they had hoped, or unknowingly (or perhaps knowingly) gets short-changed in this transaction but don’t really have a means to change the situation.

How so? The student normally prepares through a 4-year education at an institution of higher education expecting that they are well-prepared to meet the demands of the job market. As a result, they should be able to secure employment for valuable compensation that allows them to not only realize satisfaction in their chosen field of design, but also enable them to repay the debt they have incurred to the institution at which they trained and studied for the last 4-5 years.

However, many (including myself) found that to not be true. I felt ill-prepared and spent at least a year or two, on the job, training myself up to the standards necessary to produce work for a salary that was necessary to live and repay my debts.

If this problem were to be solved, the solution would enable new graduates to secure gainful employment, negotiate higher salaries and contribute more effectively to the market and their employers P&L.
Summary of Findings

Explanation of Methodology

The Industry: Now that I have sat on both sides of this fence, I can see the frustration associated with reviewing portfolios of recent graduates and not seeing the type of work or skills necessary to enable me to hire them. I also see that some skills remain untaught, even after being out of school myself after nearly 30 years. The research also demonstrates that there is skills gap. This gap is hurting the industry and students of the trade by launching them into the market ill-prepared. Companies in the market, if this problem is corrected, would be able to hire from a more qualified pool of applicants and likely be willing to take the chance required to hire a recent graduate. And, with proper skills demonstrated, these new hires would be able to contribute to the bottom line on day one.

Academia, in General: Here is where it gets a little "sticky". Why? Because I may step on a few "academic toes". The research tends to suggest the gap lies in what students are taught vs. what the industry needs. Is this due to a separation between the market and academia?

I think the research strongly suggests this. Is traditional academia prepared to train the students? Is it a problem with course of study? We aim to find all of this out, and more. I am to solve it. What is at stake for academia? There is good and bad here. I believe it could shine a light on a disconnect that, at least in the short term, identifies shortcomings.

Though, if the problem and solution are embraced from the perspective of helping produce a better end product (prepared graduates), doesn’t everyone win in that scenario? Aren’t we only as good as the product we produce? Are we, as academia, willing to identify weakness and correct it to make a better end product?

Time will tell. There are actually at least two solutions to the problem, as I intend to identify and use one avenue as a solution.

I think the inherited risk here is that if a solution cannot be embraced, and soon, academia risks losing credibility as the source of preparation for designers of the future as these skills gaps continue to widen over time.

I also think that there is a gaining demand and interest in certificate programs and community college type programs that are lower cost and more directed at producing a narrower focus on preparation for the job market. As those gain traction and offer increased affordability, what bridges the gaps there...? There, we possibly introduce a different set of gaps, where foundational education may be lacking due to the available time in the program.

I believe that I can build a viable solution that addresses the skills gaps in the form of curriculum guidance. These ideas are based in research, and can truly help the next generation of designers. I enjoy helping mentor and teach this craft to others, and I feel I can offer no greater gift than to help them be the best they can be, by helping them unlock the key to proper training that leads to a rewarding opportunity in the field of design.
The Visual Process

Explanation of Methodology

The Plan
When I started, this project was to take-on a different form. I had originally considered creating a company. That direction involved taking the solution direct to market in the form of service that I envisioned would be similar to an online “finishing” school of sorts. This service, or school, would allow graphic design students (and graduates alike) to navigate some guided learning that would finish their education, prep them for interviewing and give them a “leg-up” on the competition.

This “finishing” would involve comparing what they had learned, (in a sort of checklist style format) against what the market demanded from within my research. By comparing, they would immediately be able to see their own personal skills gaps (for the graduate) or identify potential skills gaps (the student) while still studying for their undergraduate degrees.

Once the gaps were identified, the user could then register and take courses online that would help to fill those skills gaps by teaching them the necessary skills to help them shape a body of work (demonstrated skills) that was well-rounded.

This sounded manageable in the beginning, however, once I got into the nuts and bolts of putting it all together (matching everything up into the results of research) it became a much larger “animal” to contain and work with. The idea definitely had merit, and I still may visit this concept in the near future, but it would likely end up being something quite massive in scope and very time-consuming. It quickly became obvious that despite its merit, it was not something I could produce within confines of this thesis course.

That original vision was to create something much like a combination of LinkedIn Learning meets MasterClass® Video learning where professionals in each area of study would bring important skills and topics to life. I envisioned this to be a rouce for skills ranging from typography to web design and user interface design (UI) to illustration - and everything in between.

I’ll place that original idea on a shelf for a while, and find new focus in this new, manageable and yet still powerful idea. The direction I ended-up choosing for this thesis is one that is a little closer-held to my heart.

Since my core intent is to make a difference, I can start locally, with my alma mater. I have worked with them over the years to talk with students about the job market, interviewing, and making the most of their time studying for their undergrad degrees in art-related fields. My underlying interest has always been to be a direct part of that program. What better way to combine those two, than to start by reinventing a curriculm that addresses the skills gaps...? I accomplish many things with this. I get to help my alma mater, their students, and the industry. And, it just may help me become a part of that program in the process.

So, the plan... In some ways, this approach was much larger, but yet it was a bit more approachable. I thought that this concept could be a bit “dual purpose” in that it lays the groundwork for both a university curriculum and the company idea I had in the beginning. With that in mind, it seemed as though this was the best path for the project.

To get started, I wanted to examine a few things, from not only the initial research, but to also conduct some additional fact-finding. I attempted to deconstruct what I felt were the problems and I started to question everything. When I did this exercise, a lot of interesting questions (as well as answers) came about.

Questions that immediately surfaced were:
• Is a 4-year education really the best answer?
• Could this become more of a certificate program?
• We have a great idea of what the market wants, but how do we go about training for that, exactly?
• Is the problem with the curriculum?
• Is the problem a geographical one?
• Are there adequate course offerings?
• If there are adequate course offerings, are they clearly identified for the skills they work to teach?
• Do students even know what classes to take?
• Is there proper guidance for students in selecting courses for their degree programs?
• If there is guidance, how are courses selected?
• Does this take into account a preference or specialty aim within the field? Many may aim towards animation, layout for magazines, mobile and web technologies, or even illustration and brand-building.
In the sketch above, I am working through my visual ideas of how to pull the project together in the form of a board-game, or easy to follow mapping idea.
The interesting part is that these questions continually made me question and test my direction for this project. I felt this questioning was good. It made me revisit the idea, test the hypothesis, and continually re-test it throughout the project.

I'd go from being 100% sure on something, to questioning everything. At first, those feelings seemed to undermine what I was doing, but as each question was given proper thought and then answered, it made the end product more solid.

Without having those questions arise and subsequently become answered, this would never have been the solution I wanted, or a solution worth implementing.

I also realized that this is a process. The research and examination of skills needed vs. skills taught, the path to a specialty, and really everything that embodies the project needs to be revisited on a regular basis or it would lose its value. So, why not continue to revisit it throughout the development of this original project?

As a hiring manager, I found myself asking (and answering back) questions akin to "what would I teach the students of tomorrow"? What would have given me more value? What would have made me a stronger designer at the start of my career?

Then other skills started to swirl in my head, the kind of skills that support a strong designer. I call these other skills the "soft skills" or supporting skills.

An example would be that every designer should know at least a little about marketing. They should know how to conduct a meeting. Photo shoots can be an important aspect of the job, depending on where you end-up, so students should also have some exposure to that activity. I never even got exposed to photography shoots, their planning, writing shot notes, or any of the tasks associated with a production shoot in college. Once I landed my first "big boy" design job I had to "wing it" and hope that I did well enough to keep the position.

There are so many other supporting skills that come into play, even before you get the job. Some of those included interviewing skills. This may sound pretty simple but that's also a big assumption that young people know how to give a solid performance in an interview. Simple things like, "how not to make a fool of yourself at dinner" seemed paramount. And if we do that, it's probably worth teaching them a bit about how to wrangle a fork and a knife too. We don't want them to appear savage over a meal and blow the entire deal. These things seem simple, yet overlooked once I started to examine all of the details.

Through all of my questioning, one kept bubbling-up to the top. It came to a point where I could no longer ignore it.

Are we really teaching students to secure employment in the chosen field, and then be able to perform in the job well? Sounds like a dumb question, does it not? I mean, why else would we develop a college curriculum for graphic designers or any other chosen field?

Honestly, it's worth considering. Are colleges and universities really set-up for this purpose? I'd argue, "maybe not so much".

What would make me say this? If we take an honest look at how and why things are taught, I think most would come to the same conclusion. Obviously, all programs and institutions are created equal, however, in general, it is a safe question to ask.

Is the institution or program teaching to simply pass along knowledge on particular subjects OR is there aim to prepare that student for a particular job function and do it well? Those are two very different goals. "Education" is one thing, while "job preparation" is quite another. To be clear on the point I am working toward, I think we need to look at the definitions of both words. I think that by examining these two words, we have boiled things down to their core, their ethos. And what better place to start?

What is the definition of “education”?
1a : the action or process of educating or of being educated also : a stage of such a process. b : the knowledge and development resulting from the process of being educated a person of little education. 2 : the field of study that deals mainly with methods of teaching and learning in schools. (Merriam-Webster, 21)
The Visual Process

Explanation of Methodology (continued...)

What is the definition of “preparation”?
1: the action or process of making something ready for use or service or of getting ready for some occasion, test, or duty
2: a state of being prepared
3: a preparatory act or measure
4: something that is prepared specifically: a medicinal substance made ready for use. (Merriam-Webster, 21)

Even based on those simple definitions, are programs really just educating students rather than preparing them? And, if we are to shape a plan to prepare students, it’s worth taking aim at being specific here as those simple terms are really at the heart of this entire project.

I felt that I need to set all assumptions aside. This is the core of where my questioning lead me.

For the purpose of this project, let’s be clear that the new ethos here is to prepare students for a specific role, secure employment in that field, and to properly train them to perform well.

With that established, I was able to move forward on what I felt was solid ground for preparing designers for success by meeting the needs of the job market.

As I started to pull together my ideas, I felt it important to address a few core items as I pull together a strong solution. Knowing that this problem had been researched and revisited many times over the last 30-40 years (and perhaps even much further than that) I wanted my solution to have strength and be viable.

I also felt it important to acknowledgement that while the problem could be solved, it would absolutely require ongoing attention and updates to remain strong and viable.

The market demands will change, and it is up to the directors of the programs that train students to ensure that their instruction, coursework and skills checklists are all aligned. This alignment must occur on a recurring basis. I am proposing that re-alignment would be every 3-5 years, at a minimum.

With all of this in mind, I had to ask myself a series of questions (once again) to get started with the solution. I had the research, but it was now time to dive-in and make sense of the data.

1 - What skills were job postings specifically requesting for entry level positions?
2 - Discover what courses different programs were teaching (subjects/skills/amount/etc.)
3 - Course requirements/credit hours for the specific area of study - how much was enough?
4 - What skills were missing?
5 - How would I incorporate the desired market skills into a degree plan?
6 - Provide guided learning into at least 4 main areas of Graphic Design

To be perfectly honest, number 6 came about after working through my first exercise in making a guided plan. As I started putting this together, some complexity appeared.

As a manager of creative teams, I know that there are certain specialties within graphic design. I hadn't considered was how they could be trained for those specialties. That is, until now.
The samples at right are drafts that started the main visual of the project. The top sample was where I started to work on a core course plan that was three years vs. 2. That is where I started to see flaws in sharing that same core for that length of time.

In this bottom sample, I began working through the course load as a core of the first two years and then moving into the specialty training for each type of designers.

I hadn’t yet pulled my icons together for skills, and the course list was not yet concrete, but it quickly showed that it was the more solid approach to the training as it gave adequate time for students to dive into their areas of specialty.
The Visual Process

Explanation of Methodology (continued...)

I started to work through the concept that this solution (visually) could be constructed similar to a board game. The players (students) would follow a certain set of milestones until they achieve the end result and win the game.

As with any game, there had to be parameters. How many years? How many credit hours? What was the path? Most games are linear, but I had to account for several paths now. How would this all come together?

As I matched-up skills, this seemed somewhat impossible within the confines of 4 years and 120 credit hours (the average BA program time/credit requirements). This became especially apparent as I examined different institutions.

The number of credit hours applied to graphic design-related courses ranged from 17-67% of the program duration. That is expressed as a percentage of the 120 credit hours in an average undergrad degree program.

When you think about it, that’s quite startling. If I wanted to be come a plumber, and I enrolled in a program to learn that trade only to find out that just 17% of my classes were actually plumbing related, I would be shocked.

These students are putting forth great amounts of time and effort to get trained. How can we be properly preparing them for the job market when they spend just 17% of their time learning the trade?

How much is enough?

Don’t get me wrong, I can appreciate the value of a liberal arts education where time is spent absorbing knowledge from many angles for a well-rounded education. BUT... and that is a mighty big “BUT”. We need to ask ourselves, is this about education or about preparation. It seems like I may be splitting hairs, but there is a stark difference at the core of their meanings. This is something we discussed earlier.

To move forward with my solution, I decided to approach this from a middle ground of 42%. I landed on that by starting with a four year program where you are spending some time on other subjects like math, writing, science and history - but are
The problem is, and has been, that graphic designers are not properly prepared to meet the expectations of the market. Training programs do not fully prepare students to do the job, or even to become a graphic designer. This affects the market by causing designers to spend more time and money on training, which ultimately impacts the cost of graphic design services. In addition, designers are often sought after for their skills in other areas, such as marketing and web design.

Incorporating Client Feedback
- Social Media: 42%
- Web/Digital Media: 77%
- Email Marketing: 23%
- Mobile App Design: 12%
- eCommerce: 11%
- Marketing: 58%
- Branding: 73%
- Storytelling: 15%
- Storyboards: 12%
- UI/UX: 15%
- Illustration: 69%
- Animation: 23%
- Photography: 25%
- Video: 24%
- Layout: 25%
- Typography: 70%
- Color: 30%
- Packaging: 31%
- Ecomm: 15%
- PPS: 8%

Supporting Skills:
- Time Management: 58%
- Presenting Work: 64%
- Collaboration: 46%
- Creative Brief: 47%
- Story Telling/Comms: 59%
- Integrated Campaigns: 54%
- Incorporating Client Feedback: 42%

In addition to these skills, students also need to be well rounded in the field of design. This means having a strong foundation in art, design, and science, as well as being able to work in a variety of mediums, such as digital, print, and interactive.

Core Skills
- Typography: 25%
- Video: 24%
- Digital Photography: 25%
- POS: 8%
- Packaging: 31%
- Layout: 25%
- Video: 24%
- Animation: 23%
- Illustration: 69%
- Marketing: 58%
- eCommerce: 11%
- Mobile App Design: 12%
- Social Media: 42%
- Web/Digital Media: 77%
- Email Marketing: 23%
- Branding: 73%
- Storytelling: 15%
- Storyboards: 12%
- UI/UX: 15%
- Illustration: 69%
- Animation: 23%
- Photography: 25%
- Video: 24%
- Layout: 25%
- Typography: 70%
- Color: 30%
- Packaging: 31%
- Ecomm: 15%
- PPS: 8%

Research has also uncovered a large variance in the number of classes required in the students’ specialized areas. A core foundation that includes courses such as math and science, but where students curate their appropriate training in the desired discipline of Graphic Design. This plan requires 42% based on 120 credit hours over the course of a 4 year undergraduate degree program.

This plan requires 42% based on 120 credit hours. This plan requires 42% based on 120 credit hours. This plan requires 42% based on 120 credit hours. This plan requires 42% based on 120 credit hours. This plan requires 42% based on 120 credit hours. This plan requires 42% based on 120 credit hours. This plan requires 42% based on 120 credit hours. This plan requires 42% based on 120 credit hours. This plan requires 42% based on 120 credit hours. This plan requires 42% based on 120 credit hours.
focused on the preparation for the chosen field of graphic design. To be honest, I feel my solution is a minimum at 42%.

I often speak in analogies to break down complex problems into easy-to-understand terms. I’ll attempt to do the same here.

Let’s compare that 17% course of study to a glass of orange juice.

You go to a restaurant for breakfast and order your food. Everything comes to the table, including the glass of orange juice you ordered. When they bring it to the table, it looks a little transparent. So you ask, ”What’s with the orange juice looking like orange water?” Your server responds, ”It’s the good stuff! It’s 17% real orange juice”.

You didn’t order 17% orange juice, you ordered “orange juice” and assumed it would be mostly or entirely just that - orange juice. You’d feel cheated, and rightly so.

That would be severely disappointing. Likely, you wouldn’t even drink it. I know I would not.

Somehow, we have allowed this to happen in our institutions, and the end product isn’t providing the solution as expected - especially if we start comparing that to our expectations for a simple glass of orange juice. After all, a 4-year undergraduate “education” costs a heck of a lot more than a glass of orange juice yet our protest of that, or even acknowledgement of that shortcoming has been quite softspoken.

It has been said that the modern textbook becomes out of date within the short span of just 3 years time (Dhami, 21). With that in mind, how often are university curriculums and course contents revisited for their alignment and effectiveness? It’s apparent that span of time is longer than three years.

How can alignment be kept? How can we create a system that supports this ever-evolving field of Graphic Design?

Here are some ideas for keeping that alignment fresh:

Advisory boards are one way I am proposing to keep the curriculum aligned with the industry. I am suggesting that programs keep a board of active illustrators, designers and hiring managers in these graphics fields to help advise on trends, industry shifts, needs and issues. Keeping the education programs connected to the industry is essential. This gives the curriculum and education programs validity. This could be a very effective method of maintaining alignment.

A wonderful side effect of this is that if the programs are effective, you also have some avenues to place top students with the companies represented on the advisory board.
These are the list of skills and software that were mentioned specifically. From here, I am going to apply adjusted percentages to those necessary to be a designer. Though not 100% mentioned, things such as typography, layout, and use of color are all core to being a graphic designer. This collection of captured keywords shows us some of the soft skills that round out a good designer in the eyes of employers.
The Visual Process

Explanation of Methodology (continued...)

All of the data I collected for this project is valid now, but will likely change by the end of the year 2021, and continue to evolve into the future. Therein lies the problem. This is a moving target. If we hope to build something on solid ground, we have to keep up with the changing market needs or the work will be for nothing. The consequence: We’ll find ourselves revisiting this same topic again in another 5-10 years as the data ages, the needs change and the graduates and hiring managers start to voice these same complaints about skills gaps.

To get started, I pulled together the data into a more graphic form (see sample graphic on page 35).

This brings trends into the classroom in a nearly immediate fashion. The aim is to maintain alignment between the industry and the classroom. I have seen a fair amount of the opposite in my lifetime. Instructors go from classroom in high school, to classroom in their undergraduate work, and then go to the classroom for a masters degree. The next stop is the classroom to teach. I’m not saying there is no merit there, but if we are aiming to prepare students for the workplace, I think we can all agree that some time spent in the workplace is of value. Working the job of designer, and seeing the change, the issues, and the pitfalls is worth a great deal as part of a team charged with preparing the designers of the future for that role in the workplace.

Industry Active Instructors who are working the areas for which they are teaching. Universities could shift focus from full-time instructors to ensuring there are a few, or perhaps a full staff, that are working in the industry. Alternatively, bringing in instructors who have experience beyond academia but remain immersed in their field through freelance work.

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To get started, I pulled together the data into a more graphic form (see sample graphic on page 35).

I listed all of the skills, and pull the percentage of their representation in the data next to each. I broke them down into three main categories, but focused on two. The two I chose to focus on were “portfolio skills” and supporting or “soft skills”. The portfolio skills were skills that could/should be shown in a portfolio. The soft skills were those that supported the overall value of the student in the job, as well as the portfolio skills.

The concept for this project is to build a guided curriculum that
Knowing there are specialities, I chose a core 4 to work with for the purposes of this project. There are more, and those are likely to change and evolve over the years as well. I started with these core 4 to prove the concept.

As I develop the board game approach, I wanted to have a quick reference to the skills by creating an icon for each skill. This icon would be assigned to each course in the curriculum and seen as a visual representation of what would be covered within the content of the course. A sample of what this looks like is shown in the above illustration. This is a sample of the core program, year 2, semester 1.

I examined a number of programs in graphic design. I believe I spanned a fair sampling from weak to strong, in terms of the number of courses required, and their percentage of the overall program. That ranged from a scant 17% all the way to 64% on the strong end of things. Interestingly enough, Liberty University Online’s Graphic Design program was the highest.

Knowing there are specialities, I chose a core 4 to work with for the purposes of this project. There are more, and those are likely to change and evolve over the years as well. I started with these core 4 to prove the concept.

More about what I’ll call “The Core Four”. These core four are the specialty areas I chose to focus on. They represent main areas that graphic designers tend to gravitate toward. Of course there are exceptions, but choosing four made things manageable as a starting reference for this project. Those Core Four are: The Print Designer, The Illustrator, The Digital Designer and Well-Rounded Designer.

**The Print Designer:**
This designer would be someone who wanted to focus on the world of printed materials. Catalogs, books, magazines and even packaging. Anything that put ink to paper of some kind - this is your travel path for education. Having worked in this world, I found that there are definitely people that like to have their hands on, and in, something they can touch and feel.
The Visual Process

Explanation of Methodology (continued...)

With my specialties figured out, I could then pull together the learning path for each one, laying the foundations in a two-year plan, and then diving off into each specialty in a way that gave adequate time for training and portfolio building over the following two years.

Knowing that I wanted this to be a visual, game-like solution, I worked on some sketches of how that might look. Some of the more interesting and popular games also provide for alternative paths, or shortcuts, to get to the achieved result or finish line. Here, there are no shortcuts. This sentiment rings true in terms of this thesis project, but also real life.

I moved forward thinking that this design would need to be linear, providing a solid foundation for all, but then be able to adapt and branch out to fulfill strength in each of the specialties.

For the first concept (shown on page 31), I relied on the same core for years 1 through 3. That left just one year at the end to specialize. Once I started pulling the courses and skills into the mix, this quickly showed its flaws. The last year just wasn’t enough time to build strength in a specialty. The final concept

The Illustrator:
This designer would mainly work in graphical representations, not really focusing on print, per say, but focusing on designing in a true graphical sense. More seated in Adobe Illustrator than InDesign, this person is making visuals that tell a story without the support of words. This person would have a very different path in how they build their body of work for a portfolio.

The Digital Designer:
This person is a creative with a good dose of tech to go along with. They are the type of person to aim toward digital marketing and web-related technologies as they relate to the field of design. Websites, mobile apps and digital display advertising are their focus.

The Well-Rounded Designer:
This person is the classic “Swiss Army Knife” designer that either is not sure what avenue needs to be a specialty, or perhaps just wants to make sure they have skills to wear that “well-rounded” title with pride. This is the classic graphic designer who can handle a bit of everything.
In that conversation, the details come out that fully explain what all is going on in the visual, and the research that is behind it.

Were there pitfalls along the way? Sure, they happen with every project. Luckily I didn't end up with too much rework. I was able to catch a few issues (described earlier in this document) at the beginning stages and work through them. Arranging all of the pieces took a bit of time as I worked through creating icons for each, and then working to assign them into each course, each semester and each year.

The result is shown on page 31 as my final visual solution. When I started this, I wondered how it might morph and change, and what it would end up looking like in the end. Would the strategy come through? Would it be easy to understand? Would faulty and students “get it”?

I believe this is a great example of how we can boil this down to a simple form that is easy to digest. You don’t have to know the underlying research, or all of the work that went into bringing this concept forth. However, it’s easy to look through and decipher what the paths are, what is being taught in each class, in each semester, in each year. It’s simple to digest what is to be
taught, as an instructor - and what is being learned as a student. All things that are embedded in the research, and are the building blocks of an excellent resume.

The biggest hurdle I see with this solution is that it represents change. As with most any change, that means it needs embraced. It needs nurtured and it needs revisited often to ensure it does what it is designed to accomplish.

I also realize that some institutions and people resist change. It’s scary, and sometimes uncharted territory. It means learning, and it means abandoning old ways of doing things. But it can also mean growth, excitement, and learning.

I also produced a pair of short videos that helped explain what I have described above. Using Adobe Spark and images from the project, I assembled two short videos outlining the concepts behind the icons, the skills and the curriculum map.

In the first video, I talk about the problem and my first-hand experience which drove me to work toward a solution. It’s a great overview of the entire project and the thinking behind.

The second video is an overview of the solution and how it reinforces the skills found in the research.

This should be expanded where instructional programs have the resources to get even more specialized. But at the core, I believe this represents the minimum standard of preparing our graphic design students of tomorrow for the industry in which they want to work. And it provides well-trained graduates for the companies that are so eager to hire them - enjoy the fruits of their labor and creativity.
The Final Solution

A Walk-Through the Final Solution

Introduction
In this section, I am walking you through the final solution I have built, piece by piece. This has its foundations in the research conducted. That research consisted cataloging job listings for entry level positions as a graphic designer as well as research materials that reinforced the problem and its persistence over the years.

Along with research, I was also able to rely on personal experience. I’ve worked all four of these focus areas in my career that has spanned over 25 years. I have an understanding of what I’d be looking for in a candidate for those positions. There have been some “ah-ha” moments in this, where I have envisioned advising a younger version of myself. In those interactions I saw myself passing along the information that I wished I had known then, but had to learn on the job or by trial and error.

In essence, supported by research, I took to this project in such a way as to design my ideal or dream curriculum that would have pushed me further, made me a better designer and boosted my career if I had these skills at graduation. Why, you ask? Because I want to help shape the designers of the future. I want them to be prepared for success where I was not.

I got lucky, I got some breaks and I had to work really hard to be where I am. I realize life is a continual learning process, but if I had a better foundation in the beginning, I have no doubt that I could have done even more. I want that for others, and especially for my daughter who is a second year graphic design student right now.

To kick off this project, I took the skills list, combined with a median course load for the 120 hours and broke it down into a four year program that gives a 2 year core with 2 years provided for specialty focus and portfolio-building.

Graphic Design Education // Year One

Semester 1:
History of Graphic Design and Basic Drawing Skills. If there ever was something to consider the “bread and butter” of graphic design - here it is. Knowing where we came from, and then being able to convey an idea in a sketch - these are the absolute foundations of a designer.

Marketing 101. I wish I had this course early on in my career. Not much that we do (as designers) functions very well without having some sort of marketing backbone. Normally, designers are part of a marketing department or team. Knowing why decisions are made, who the target audience is, and what the driving force behind the piece or campaign is valuable.
To build on things even further as our foundation, we add digital imaging that will help with doing more with the images they now know how to capture (thanks to digital photography). Then add some growth in typography skills and then through illustration, bring some “vector goodness” to the mix. The vector illustration seems natural as there always seems to be the “ask” of custom icons and elements that work where photos can’t or won’t. With these courses as our base, we can move forward down paths that lead into the areas of specialty.

Graphic Design Education // Year Two

Semester 1:
• Graphic Design 1
• Typography
• Digital Photography

Now that the student is “armed” with some basics, they have a solid foundation on which we can start building some design principles. I now have them moving into graphic design, typography and digital photography. On a most basic level, you’ll find these three skills or items in most any project. The ability to take a good photo, arrange it with some type and produce a design project is a great core set of skills.

Semester 2:
• Digital Imaging
• Typography 2
• Vector Illustration

Now that the student is armed with some basics, they have a solid foundation on which we can start building some design principles. I now have them moving into graphic design, typography and digital photography. On a most basic level, you’ll find these three skills or items in most any project. The ability to take a good photo, arrange it with some type and produce a design project is a great core set of skills.
The Final Solution

Explanation of Methodology

Graphic Design Education // Year Three

This is where things get interesting and we start to dive into the specialties, training directly for that. Here, I need to break into four different paths and take some time to explain each.

For the Print Designer:

Semester 1:
• Advertising Design
• Publication Design
• Graphic Design 2

The print designers need that background to flow text and work in ways most others don't with larger documents. This is where the publication design course pulls in those skills. The aim is to prep for Magazines, books and design of other publications through print and digital means. Advertising Design gives that dose of just that, "advertising design". Then we round things out with the sequel to Graphic Design in part deux.

Semester 2:
• Package Design
• Portfolio Preparation
• Graphic Design 3

At the end of this year three, I pull together a mix that has always struck me as a wise move. Reviewing portfolios in your last semester of school seems like a huge disservice to everyone involved. There is little time to alter your course at that time. Reviewing what you have so far, at the end of year three and suggesting adjustments seems wise. Aim toward projects that fill the gaps. Is there a theme to the portfolio? Do you have a website? Is it all arranged in the most effective manner? Start now, and you have a full year to make it the best possible product. Then revisit again just before graduation for final edits.

Add in some package design for retail-ready portfolio samples and part three of the series in Graphic Design. The projects get more complex and more and more on par for professional work samples.

By now, everything should be "portfolio-ready", complete with ingredient lists, UPC codes, and everything that separates its appearance from just a classroom exercise.
For the Well-Rounded Designer:

**Semester 1:**
- Publication Design
- HTML/CSS
- Graphic Design 2

For the well-rounded designer, it’s time for a shot of Graphic Design (part two) along with a little HTML/CSS for the web design experience, and some learning aimed at pulling together pubs (magazines, books and larger projects of that sort). We start to build that well-rounded approach to making the student that classic “Swiss Army Knife” of a designer. This is the approach I took, by accident, as I learned my way through several jobs in my first few years after college. I found great success in knowing at least a little about a lot (vs. a lot about a little). Having a broad background can be a real advantage, especially with smaller, growing companies that need a lot of different kinds of design work pulled together.

**Semester 2:**
- Digital Imaging 2
- Portfolio Preparation
- Graphic Design 3

Animation for the illustrator is a good, logical move to learn the creation of those moving sequences that are powerful. Again, that foresight in reviewing portfolios here just makes great sense to me. Let’s review, plan and decide what is next. What makes our portfolio stronger over the coming year. We also round-out the semester with Graphic Design 3.

For the Illustrator:

**Semester 1:**
- Vector Illustration 2
- Digital Imaging 2
- Graphic Design 2

For the illustrator, the next step takes hold along with a second dose of Digital Imaging. Then we round things out with the sequel to Graphic Design in part deux. Illustration can range from prototyping products to conveying complex ideas that are difficult to convey through photography, so this is where I aim to build those skills.

**Semester 2:**
- Animation
- Portfolio Preparation
- Graphic Design 3

In this semester, we are working on Digital Imaging, Graphic Design 3 and the Portfolio prep. We work on making a plan for the final year’s work to make the portfolio the best it can be.
Explanation of Methodology (continued...)

For the Digital Designer:

Semester 1:
- Animation
- HTML/CSS
- Interactive Design

Knowing a bit of animation, even in its simplest form, along with the HTML and CSS knowledge while tying it together with Interactive Design principles through proper UI/UX - those are powerful and core to this type of work. This builds a great foundation for design in the digital space. Understanding these core digital skill sets can take a person far, professionally.

Semester 2:
- Digital Imaging 2
- Portfolio Preparation
- Graphic Design 3

Again, the plan here is to add some Digital Imaging, bring in the final course in Graphic Design and then round out the year with review of that portfolio. What do you have? What do you want to have? Is there a theme? Identify the gaps and work to fill them in the final year.

For the Print Designer:

Semester 1:
- Vector Illustration 2
- Publication Design 2
- Practicum

As we finish-off the program, we end with part 2 of vector illustration, Publication Design 2, and the oh-so important Practicum. This is something that I had not done prior to coming to Liberty, and it has shown me its importance. Having a real-world, large project with a bona-fide employer as part of your experience is invaluable. It will be a definite value, in terms of stretching a student’s skills and opening their eyes to the real world. The reason I separated this and Internship is that I tried both at the same time, and I cannot express just how tiring that is, especially if you are trying to work at all outside of your classes. For me, both times around - BFA and MFA - I was working full-time through it all. And, I think some time for reflection between a single big project, and then getting hammered with multiple projects in that real-world setting (internship) is important.
For the Illustrator:

**Semester 1:**
- Vector Illustration 3
- HTML/CSS
- Practicum

Here we are finishing up semester one with Vector Illustration 3, which seems like a no-brainer (and is). HTML/CSS may come as a shock, though an illustrator can be tapped for or decide to go digital. Having the aptitude to pull together that work product in a fashion that is suitable for web use is valuable. Follow-up with the practicum for an opportunity to work on a large, real-world project and you have a winning trifecta of illustration goodness that’s got this student ready for the final semester.

**Semester 2:**
- Package Design 2
- Interviewing/Etiquette
- Internship

Our first designer is ready for graduation after this line-up. Package Design 2 allows for some more polished samples that are ready for the portfolio. The Internship brings actual, real-world experience to the student via multiple projects of all kinds, converging deadlines, and the entire feedback loop. I also felt it important to add in some simple, yet terribly important skills that may be overlooked entirely. How to interview, how to write a letter of application, and how to dress and act in a job interview. How to negotiate salary and benefits, and last, but certainly not least, how to eat dinner and not look like a neandertal.

I’m sure that last sentence got a chuckle out of a few readers, but it’s so true. Here, we give some simple tips on how to handle a fork and knife, how to behave, how to start conversations, and what not to do. All important things that can help students get that edge and secure that very important first job.

Here we are finishing up semester one with Vector Illustration 3, which seems like a no-brainer (and is). HTML/CSS may come as a shock, though an illustrator can be tapped for or decide to go digital. Having the aptitude to pull together that work product in a fashion that is suitable for web use is valuable. Follow-up with the practicum for an opportunity to work on a large, real-world project and you have a winning trifecta of illustration goodness that’s got this student ready for the final semester.

**Semester 2:**
- Packaging Design
- Interviewing/Etiquette
- Internship

Package Design rounds out the last of the courses while the standard Internship brings about that real-world experience of multiple projects and the deadlines that come along with. And, that Interviewing/Etiquette course is sure to bring some helpful tips for anything from writing letters, negotiating salaries and dressing the part to handling a fork, knife and spoon like the civilized person we want you to be.
The Final Solution

Explanation of Methodology (continued...)

For the Well-Rounded Designer:

Semester 1:
- Publication Design
- Vector Illustration 2
- Practicum

We’ll round out this last semester with a single course in the field, and Animation is that one for this design focus. The well-rounded designer now has some motion graphics under his or her belt as they also add the Interviewing and Etiquette course along with the internship portion. We’ve covered those last two a couple of times already, but the importance is not to be underestimated. Hiring managers may want you to jump into meetings with clients which usually involves conversation, food and behaving like you’ve been at this for a while. This is where we help give students a leg-up on having their etiquette refreshed for a favorable opinion to be formed about them.

Semester 2:
- Animation
- Interviewing/Etiquette
- Internship

For the Digital Designer:

Semester 1:
- Animation 2
- HTML/CSS 2
- Practicum

A second round of Animation and HTML/CSS rounds out this semester along with the Practicum. Having that double dose of both strengthens the portfolio and learning for both, which are strongholds for unlocking potent designs in the digital space. Add in that practicum and the portfolio should be looking good as they enter the last semester of their preparations for the good work ahead in their careers. That big project in the real world, and then on to the Internship next semester.

Semester 2:
- Digital Imaging 3
- Interviewing/Etiquette
- Internship

The third and final dose of Digital Imaging hits here. This designer is heading into that Internship now too, where the real world experience hits and rounds things out. And, let’s not forget the Interviewing/Etiquette course that helps them not chew with their mouth open (mom and dad would be mortified to find out that is what you did, right?) and not wear a meal while eating it.
My proposed solution requires 42% based on 120 credit hours. This still allows for a liberal arts or religious education foundation that includes courses such as math, science and religion but gives a fair amount of time dedicated to training in the desired discipline of Graphic Design.

How did I come to this 42% conclusion? I worked within the confines of 120 credit hours and built a program that meets the requirements of the skills research for four main focus areas of study. I injected my own personal experience into the equation as well. I have been a designer and hiring manager that has seen these shortcomings first hand. I have also felt the pinch of being ill-prepared for the job market myself, back in 1995. It was mind-blowing to see the same problem still in existence along with discovering the topic had researched over and over yet never solved.

I honestly still think that 42% is a low number. Looking back to my orange juice comparison, or if you were to compare to any other product, it would immediately feel like a shortcoming, and perhaps even a faulty product or smooth marketing tactic that over-sold and under-delivered.

I feel this short story may be appropriate here. I have a friend that didn’t grow up with much. He was raised on a very modest income by a single mom. His mom, to his dismay, stressed the importance of proper etiquette at the table. When asked why, her response was, “Some day you may be eating with kings and queens”. He never thought much about that statement, until the last few years. He’s successfully started a few companies, and through the course of his latest one, he ended up needing to make a deal with the King of Jordan. And in the deal-making he did just as his mother prepared him to do. He had dinner with a king and made that deal.

The point here is that you just never know. It’s better to be prepared than assume. First impressions are important, and I’d hate my children or students to prepare for a career only to get passed over because they eat like a savage.

Details are important, and as designers, this will be a guiding principle throughout their career. It is good to stress this principle now. This entire exercise is for the purpose of preparing them to gain employment and be successful in that endeavor. Side-stepping any part of that process is an extreme disservice to them. And, by not preparing them properly, we are doing a disservice to ourselves.

For the "Training Time" portion, my research has also uncovered a large variance in the number of classes required in Graphic Design. The percents of credits spent on graphic design ranged from 16% to 64% over the course of a 4 year undergraduate degree program.

I feel it is interesting to note that Liberty University’s online program for a Graphic Design BFA was ranked the highest among those I sampled with 64%. That was reassuring as I am ending my studies for my MFA with LUO currently. The program is strong, and much modeling for this project was taken from what is being done at Liberty.
The Final Solution

Explanation of Methodology (continued...)

I want to take some time to discuss the “Soft Skills” that went into this project. The Portfolio Skills, or “Hard Skills” are somewhat of a no-brainer. Anyone in the design field can look at those skills and agree that they are valuable and necessary.

Soft skills that need reinforced, and were also mentioned in the research are below.

- Time Management ........................................... 58%
- Presenting Work ................................................ 64%
- Collaboration ..................................................... 46%
- Creative Brief ..................................................... 47%
- Story Telling/Comms ...................................... 59%
- Integrated Campaigns ....................................... 54%
- Incorporating Client Feedback

The above items were part of the research and, as you can see, heavily represented in the qualifications for the job listings for level designers.

I added the last one of “incorporating client feedback” as I feel that is important to note. Though we are in a classroom setting, incorporating feedback is important. I would consider peer review and feedback to be a similar situation. And, as such, it should be a part of courses and then also reinforced to the student that it is experience that they can list on a resume.

Time management, one could argue, is the entire university experience. Being able to talk about real work experience, and the converging deadlines that come along with that work, is important as well. It all speaks to time management and prioritization.

Presenting work is perhaps the most important on this list. Presenting is similar to selling, and as designers we need to be able to sell our work. Giving justifications as to why we chose certain colors, fonts, layouts - all part of giving our work product some “substance”. Usually, we are presenting to groups with little or no design background. And, let’s face it, it seems that everyone is an art critic yet nearly none are true artists. Having the ability to justify your decisions and talk about them gives merit to your work and the process through which it was produced.

Collaboration experience lets a company know that you have worked in a team environment and it better prepares you to answer tough interview questions such as, “tell us about a time when you ran into difficulty with a person or project and how you dealt with that.”

One should also have some experience with understanding a creative brief. This also gives the opportunity to learn to ask the right questions when the answers are not clear. This is good practice for the real world, when you may be in a new industry or working with new teams - there may be underlying assumed knowledge, and asking the right questions will help you get off to a great start - and keep your work product tip-top.

Story Telling goes along with Presenting Work, in that both require you to be able to convey ideas and talk in groups. Story Telling goes a step further and gives students the experience of talking about a project or through a scenario. It can be about an idea, or a campaign and how the creative was set-up. A lot of times, my team and I would create backstories about characters within our photography shoots. If there is a story about each person and why they are there, you can also answer questions about whether a situation is believable. That back story dictates how models interact with one another, what clothes they wear, where they are, what they eat, and what they are doing. Telling a story is a good exercise in communication.

Integrated Campaigns. This one I feel is perhaps the easiest one to pull-off, and probably the one that is overlooked the most. If you are creating a wine label for a course, it is rather simple to go ahead and pull off a couple of additional pieces to support that. For instance, take the label and work-up an advertisement, and a website design draft, a shirt design, or outdoor sign mock-up.

Showing that you can take a brand guideline and apply it across multiple types of projects and carry the consistent brand look is important. That is the underlying concept in an integrated campaign - take similar assets and concepts and applying them across multiple channels so that they all appear to belong together. That can be a mobile ad, google ad, t-shirt, label design, to an event poster. It’s easy to take a project and spin-off other projects that go along with yet it’s not done near enough.
Conclusion

Summary and Review

This project was something I had struggled with, at first. The biggest part was how I was going to solve the problem visually. Though it’s something I feel I have done all of my life, choosing the right problem - something with enough impact that it would be engaging and meaningful - that took some time. And then to figure out how to visually represent those ideas... I knew the solution was important, so the added stress of that didn’t make it any easier.

The more I talked with others in the field, their stories seemed to match mine. We struggled, felt ill-prepared. Was it just a typical college sentiment, or was there more to this? I wanted to find out. Even my thesis committee chair had similar stories. Knowing that, the idea became even stronger, and the solution even more important.

As a hiring manager, I was hiring for an open position around the same time I started to dive into this project. I had difficulty interviewing new graduates who obviously were ill-prepared for the job market. Portfolios varied greatly in terms of content and quality. Of course, that is going to be the likely case for all, but in terms of what was in them - or rather what was NOT in the portfolios - that was the rude awakening. Some had what appeared to be an artwork sample without purpose. It was more fine art in nature, or illustrative but missing all context. They didn’t know what to say about their work, or sell the contents of the portfolio to me. Much of it was awkward, and I felt bad for them.

The disappointments did not stop there, however. They started to compound. Not only was the problem real, it really had been that way for a good number of years. The more I dug for research, the more instances I found. On top of that, there was a ton of articles and existing research that discussed the same general topic of getting properly prepared designers into the workplace. However, there were no good solutions.

For this project, my initial solution was drawn from my true capitalist heart and soul. Where there is a problem, there is money to be made solving it! "Let’s start a company", I thought. "I could build a preparation model (notice I didn’t use “education”) and fill the gaps - for a fee!"

As I talked more about the solution with my committee chair, the idea started to evolve. I decided to aim for a curriculum plan. This would be needed to move forward with the company idea but had an added bonus of being able to take the research findings and the final project - and put those to use for a local university program. With this in mind, I got started working.

The research was something new to me. As a life-long designer, I had never really attacked a research problem. Usually, that comes with the client and project.

I knew there was a gap, and I had testimony from others, but how do I prove it? The best way I can think of, beyond the existing research material, was to actually survey the market by examining a cross-section of live job postings for entry level graphic designers.

The existing research proved the gap. The new research of the job market would provide the roadmap for creating the solution.

Learning through this process has been quite non-stop. It seems that I felt I had it all figured out at least a few times during this project, only to start questioning my line of thinking. I think that is good, though. If you aren’t asking questions, you’re not learning.

I found myself asking if it was simply a guidance issue...? Or could it be something local in terms of geography? Was it the aim of the institutions to even prepare students for work? If we stop assuming and break things down to the bare bones and question it all, I feel that is how we end up getting to the root of problems - and then solving them!
What Have I Learned?

So, what did I learn? I am not sure where to start with that one...

For starters, I learned a lot of “non-art” information, mostly centered around research. Supporting books for the thesis preparation course were great. Being that “art guy” for my entire life, research is not something I knew much about. That was probably the most daunting part of this entire course and experience. The visual part, that is almost second nature to me.

Usually, as designers, we are not the source of the information, though we are charged with making it look presentable, understandable and interesting.

With this project, it all came from me. That was a big difference. Then pulling together a document that is 50+ pages long in which I'd describe the problem, the research, the research results, the solution and then what I take away from the entire thing.

In that entire process, you learn a lot about what you're directly researching and writing about, but you also start to learn a lot about yourself.

This helped me examine how I do things, in my professional life. How I interact with my direct reports, and how I mentor them has been a benefit from the work performed on this project.

My work there, while at my day job, is to help them learn and grow -and eventually replace me. Preparation for the job market through a university degree program is really no different. We should be training those students to eventually take our places. They will be the stewards of the trade after we retire.

I learned a lot about the make-up for design programs. As I examined the course work required for a degree in graphic design, the difference in the amount of courses was staggering. I was amazed that there would be that much difference in course requirements.

Learning continued through research into the skills that came out as the leading “asks” from employers. It was also a little shocking to read some of the skills and experience requested of entry-level positions. Some of these would also make a good case for coop-type work/education programs where students would actually spend a good portion of their time (25-50%).

My son is enrolled in a program like this, and I think this could also be a valuable model to review for graphic design. He spends 3 months in class, and 3 months working as an engineer with an automaker. They repeat this cycle for 5 years (12 months per year) and the students come out with an engineering degree and 2.5 years of experience - real world experience.

I learned a lot about assumptions. Through this process I started to question everything. I truly wanted to step back from a process that I was not only close to, but also to which I was a little emotionally attached.

When I stepped back, and stopped assuming anything - I questioned everything. Education vs. Preparation was one big one. What's the aim here? We would all assume college is intended to prepare students for a job, but is it really? I am not entirely sure that is the case with all universities. How do we know? How can we change this?

I think really the summed-up version of what I learned here is that I learned to question the process. And I learned it's good to question it all. I learned more and really got involved with the project when that happened. Writing about it was easier, it became a passion to work through a question and discuss how it might impact the process and the end result.

I was a little intimidated by the project in the beginning. I'm still a little intimidated by it all, but it was so engaging to tackle the subject, see what the research provided and then put it into a visual solution. And, perhaps the biggest piece of that was to feel like it really mattered and was going to be worth something in the end.

Most times as we produce projects in our designer lives, the end product is for someone else. It's a packaging project, an illustration, a mock-up, a website. But it's all usually for another in exchange for a dollar. Here, it was something that I felt was for me, for my daughter, and for the designers who will carry the trade long after I am gone. And that prospect meant a great deal to me throughout.
Conclusion

How Have I Grown?

This is an interesting question...

One of the ways I have grown from this process is that it gave me an opportunity to look at an issue that is dear to me. It also gave me the opportunity and support in which I could work to formulate a solution.

I had a unique perspective having been a student who felt ill-prepared for my design career yet being the manager who is now hiring for those types of positions.

The exercise in research allowed me to understand that the problem is not unique. Not that it brings me any comfort to know that I am not alone, but it was satisfying to know that the problem is legitimate and well-documented.

It was also a great learning process to take what I thought were core skills for a designer and put that to the test against what the data would show. There were some interesting things uncovered that make sense. We're not working in a silo. Designers interface with marketers, leadership, writers, photographers and really end up being a creative hub for the business. Being able to "sell" work is important. Along with creative talent, I would almost say that is the number one skill. You need to be able to talk about your work, or you risk it being minimized. It was great to see that brought up in a good bit in the job posting research I performed.

I also learned that designing a curriculum isn't as easy as it may sound. I am, even still, constantly revisiting the visual solution for this project. Changes have been made through even the writing of this document. I suspect that will continue to be refined until (and while) it gets introduced.

Finding the correct cadence and mix of learning opportunities was challenging, and using the approach of guiding through a specialty is something relatively new.

As mentioned in the project itself, continuous change is at the core of this entire concept. It has to be ever-changing, ever-mindful of the demands of the market. It has to be able to change rather quickly to remain relevant. This is why that constant touch with the market is so important. Having an advisory board and/or faculty that professional working relationships in the trade is essential.

Continual research of the market is essential as well.

Another valuable experience from this is my ability to directly put this to use now. I can, and already have, put this to work for my daughter who is a 3rd year design student at a local university. Through my freelance opportunities, I am pulling my daughter into the mix for the experience it offers. I can somewhat test what I have learned from this research by providing her opportunities that build the necessary skills.

Through that experience with my daughter, it will also help me grow as an instructor and mentor.

This entire project has enabled me to grow as that mentor at work as well. I manage a small marketing team that produces anything from websites to print materials - and everything in between. I’ve been putting this to work with my team. I work to reinforce the market skills in each of them through their daily work and our conversations.

This thesis research and reflection experience has made me a better mentor, a I’d argue that it has made me a better instructor (or candidate for that job) by opening my eyes to what goes into developing students and the assignments put before them through course work. The feedback given to them, the development conversations and the constant advisement that happens between a student and teacher.

I really look forward to spreading this information. I feel it needs to be put "out there" and action taken. I realize it can be slow to implement things of this nature, but I think it will open some eyes and help others to grow, which is at the heart of the entire project.
I’d like to see this plan come together in the future. Obviously, I’d like for institutions of higher learning to adopt a similar approach to how they shape their curriculum and subsequently prepare graphic designers for their real-world work.

In all honesty, this same approach can be - SHOULD BE - applied to all career preparation programs. And, as discussed previously, perhaps that is where this really starts. If we start calling it something different, then we think about it differently as well. It’s not merely an education, it’s a preparation process.

By asking ourselves one simple question, we can ensure that our programs are aligned to the proper outcome.

"Does this course, activity, thought process or assignment aid in preparing the student for the real world job market?"

If the answer is "no", then let’s all stop doing that. If there are things missing, let’s starting doing that instead.

In short, I would love to see this implemented across all programs so that the students find success, and the side effect will be a better trained workforce ready to handle the demands of the job. Everyone wins.

The other way I would like to see this come about, is to start a company that fills the gaps. That’s the capitalist inside me speaking again. But, let’s be realistic for a moment. The prospect of the gaps being filled with a solution like this across all programs, or even a majority, in the near future is quite slim. While I would love to be the person to help students and the market with proper preparations for the field, as an entrepreneur, I can also sense opportunity to create something great in terms of revenue. I have floated the idea of this offering to a few trusted individuals in the graphic design and education fields, and all are on-board with the concept. In fact, they all wanted to be involved, so I know that I am onto something valuable with this.

In most areas, academia will be slow to react. Some, I imagine, won’t react at all. With that lack of action comes opportunity.

In reality, I don’t need credit, and I don’t need to see a dime in revenue. Knowing that someone just like my younger self, someone like my daughter or sons - to know that I helped make a process better would make me feel great. Giving back to a field that I love would be extremely satisfying.

On that note, there is actually a third way I’d like to see this implemented. That third way is for me to take this body of research, along with my solution, and put it to work for a design program with a University. This would be the most satisfying possibility of them all. With my MFA, perhaps it is possible to return as an instructor and give back directly to students and the industry in that capacity.

With this project being one of the last “checkboxes” in my MFA program with Liberty University, I am aiming toward that type of teaching opportunity to directly make a difference in the lives of the students who will be the designers of tomorrow.

Having "been there" and "done that", I would be delighted to bring some real-world assignments, advice, mentoring and positive change. Those things were the driving force in me pursuing my MFA in the first place. Having this all come full circle, in the way that it has, is very satisfying.

I look forward to what the future brings with this research in my mind, and change that could happen when it is put into place to help prepare students for a rewarding career as graphic designers.

Where Do We Go From Here?
Though this is from Jordan, it tackles much of what I am looking to work with in terms of data, and comparisons. It legitimizes the problem, and may parallel much of what I do, though for a different geographical location. Here, Ghada conducts research into the same problem I am hypothesizing, and breaks it down into a way that perhaps I can approach from as well. Developing a curriculum map of skills and polling graduates to see how they felt they were prepared by their college education.


This work also sets the stage for my research in terms of authenticating what designers are expected to deliver as "competent" as divided into three main areas: (1) what graphic designers are expected to deliver (competence areas), (2) what graphic designers are expected to know (knowledge and skills), and (3) what personal characteristics graphic designers are expected to have. From the Abstract: "In this paper we explore how the 'employable' student and 'ideal' future creative worker is prefigured, constructed and experienced through higher education work placements in the creative sector, based on a recent small scale qualitative study"


This piece focuses on alignment of curriculum. This is proof positive that there is a gap in skills, and through this program, they have been working to alleviate the gap, or perceived gap. I think the data and analysis will prove helpful in developing the research behind the problem as I see it.


Some good perspective on work environments and placement. Hoping for some nuggets of information relating to how that plays out, in terms of preparedness.


Here, we see some data and analysis into how different skills are valued by students, teachers and then by companies. Again, another angle or lens through which to possibly view the problem, and start to formulate answers.


Exploration into student perceptions and work-related learning. Again, this offers yet another angle. Through these many different angles of curriculum, data, student perceptions, etc - I feel I can pull together a very good, in-depth understanding of the problem.


I can't really summarize any better than this, so here it is direct from the abstract: "A survey was carried out to determine whether the way Design is taught at secondary and university level in the UK, adequately prepares pupils who choose to pursue a career in design and then to determine ways that it could be improved."

From the abstract: Purpose The purpose of this paper is to present a case study to discuss approaches taken within a traditional undergraduate degree course to embed employability skills, encourage student uptake of sandwich placement and increase graduate prospects.


A very good article with some historical perspective. Discussion around skills-based training and what it takes to supply competent graduates that are ready for the industry. Design thinking, theories, and a multidisciplinary approach can help students to keep pace with the developments in the social and economic environment.


Comparison between the digital teaching methods and traditional teaching methods. This paper is a theoretical study using a qualitative, case study approach. The paper also suggests a set of recommendations and strategies that can enhance various intellectual and physical skills. Includes recommendations to develop a framework that would be ideal in developing a new curriculum of graphic design teach for undergraduate students.

Tucker, Emma. "How Do We Bridge the Gap between Design Degree and Studio Life?" Creative Review, 24 June 2019, creativereview.co.uk/bridging-the-gap-between-design-degree-and-studio-life/.

Australian initiative, This Is Not University introduces students and graduates to the everyday realities of working in a busy design studio, with the aim of filling in the skills left lacking by many creative degrees. Again, reinforcing the problem that there is a definite gap between what students are learning and what the workplace is expecting.
Onink, Troy. “Why College Co-Op Programs Totally Rock” Forbes. com, 27 February 2012. business.csuohio.edu/sites/csuo. hio.edu/business/files/TotallyRock.pdf. This article discusses the value of cooperative education where students have a chance to not only learn pertinent workplace skills that are timely, but they are also earning their way through school at a pace that helps them gain an advantage financially when they graduate by helping eliminate debt.


More discussion on what is being taught vs. what students feel they need or needed for a career in Graphic Design or Graphic Communications careers.


The purpose of this study was to identify 21st century skills, content knowledge, and tools needed in an effective university-level graphic design program. Inconsistencies in the graphic design curriculum, fueled by the increasingly large number of programs and concentrations and the inability to track graduates were some of the issues that led to a need for this study.


This research discusses the testing of the relationship between creative output and skills considered important for competent performance in graphic design. How to assess graphic design creativity in a manner credible to both the creativity research and design research community.


Insight into necessary skills at the time (2016) for what it takes to be successful in the field of Graphic Design.

Foote, Cameron S. The Business Side of Creativity. W W Norton & Co Inc; Updated edition (June 1, 2002)

This offers a good look at business skills that are required for the Graphic Designer as well as writers too. It identifies skills that aren’t taught in most university settings. After all, someone saw a gap and wrote a book to help fill the gap. I happen to own this one, and it was invaluable in helping me run my own business.


Other Articles & Sources to be explored:
https://datausa.io/profile/cip/graphic-design#institutions
https://www.bls.gov/ooh/arts-and-design/graphic-designers.htm
https://www.monster.com/career-advice/article/5-essential-skills-for-graphic-design
https://www.condorcapital.com/blog/2017/06/08/growing-skills-gap/
https://www.goskills.com/Resources/Skills-gap-analysis

Additional Thoughts:
Look at top states/Schools who produce the most graphic design graduates and research what their programs offer.

Look at their placement rates (is this even available to the public)?

What are the skills that are said to be a requirement for graphic design?

Do the top programs/states/schools align with this?


https://www.wayup.com/guide/entry-level-graphic-design-job-guide/
