Chapter 1

The Basics:

Principles and practices of Project-based learning (PBL) and Project-based language learning (PBLL)

It all starts with a problem - not one created to practice a point of grammar or vocabulary from a textbook - but one from the real world, an authentic problem in need of a real solution. It is a complex problem - not one whose solution can be arrived at through group work in the span of a class or two – but, rather, a problem requiring sustained effort, including gathering, organizing, and presenting information. It is an engaging problem to students, selected in consultation with them - not solely on the basis of what's in a textbook or instructor preference. Finally, it is a problem that follows a structured inquiry process carefully designed to support learning – not a casual and loosely structured activity that happens after the "real" learning has taken place.

Though many of the principles and practices of project-based language learning (PBL) align well with those of heritage- and second-language teaching, others deviate significantly and thus will require some openness to trying new ways of doing things. This is the reason why we started this chapter by describing the core properties of PBL in opposition to some common practices of L2 teaching. Helping teachers find ways to reconcile these differences as well as ways to build on the commonalities of the two approaches is a principal goal of this book. Given the

demands of this task, our first step – what this chapter is about - is to provide an introduction to PBL.

By way of preliminaries, readers may want to turn now to the section "Taking Stock of what we have learned" at the end of this chapter and fill in the first KWL chart. We will return to this chart at the end of this chapter. Also, our working definition of PBL is included below.

PBL is a learner-centered and standards-driven teaching approach in which students apply problem-solving skills to address a complex, real-life challenge and where they communicate their learning through the development of a public product.

We will start with some background on PBL. Following that, we will examine a project in detail, focusing on how it instantiates the core features of project design in general, as well as specifically for language learning. We will close the chapter by exploring adaptations of this project for different age groups and proficiency levels.

A brief history of PBL and other preliminaries

PBL has been around for a long time, though its application to foreign language teaching is relatively new and under-developed, as compared to other disciplines, such as engineering, business, and the social sciences. In the early 20th Century PBL is most closely associated with the American philosopher and educational reformist, John Dewey, who championed the benefits of experiential learning arguing that "education is not an affair of 'telling' and being told, but an active and constructive process" (p. 38). Advances in cognitive science and educational research have

validated these ideas, in particular, the interconnectedness of learning and doing, as well as of learning and social interaction, the latter being a foundational principle of Social Constructivism and Vygotsky's Sociocultural Theory, both of which have been highly influential in education. In chapter 3 we will look at Sociocultural Theory in the context of discussing how to gauge the level of difficulty of products and how to design scaffolding activities in a PBL format.

In recent years, PBL's close association with 21st Century skills has further solidified its pedagogical credentials and boosted its popularity in schools. Such skills include a range of abilities, habits of mind, dispositions, etc., that are deemed necessary for success in school, work, and life in the 21st century, in particular: collaboration, knowledge construction, skilled communication, global awareness, self-regulation, real world problem solving, and use of technology for learning and critical thinking (Gallup, 2013).

Specific to the K-12 context, emerging research suggests that PBL can boost learning outcomes in the core content areas of the curriculum, in particular, science, social studies, English, mathematics. PBL has also been shown to be an effective approach with language minority students as well as other underserved populations (Kingston, 2018).

PBLWorks, a leader in all-things PBL, describes the benefits of this approach as follows:

- transforms students by inspiring them to think differently about themselves as learners, collaborators, and leaders.

- prepares students for academic, personal, and career success; what's more, it readies young people to rise to the challenges of their lives and the world they will inherit.
- leads students to master core academic content and builds critical thinking, problem solving, collaboration, communication, and self-management skills.
- advances educational equity and empowers youth furthest from opportunity.
- enables teachers to make a difference in their students' lives—academically, socially, and emotionally—and to experience the joy of teaching.

In our practice, we have also found that PBL also improves the subjective experience of teachers by combatting the boredom resulting from the repetitive nature of traditional instruction and its attendant fixed instructional topics, textbooks, and pedagogical materials. By contrast, projects vary according to student choice and other circumstances, which means that no two classes will ever be exactly alike. As projects vary, teachers are exposed to new ideas, challenges, etc., which means that they are also engaged and learning.

Needless to say, boredom is also a problem for students. Studies indicate that students want more opportunities for active learning and the ability to discuss their ideas with others. The selected responses below from a survey of high school students by Wiggins (2014) reflect these desires and, to the point of this chapter, point to the best practices of PBL that will be discussed shortly (see also National Survey of Student Engagement, 2013).

- Try something creative when teaching something new
- To not talk the entire time and give us more hands on things to do /work on.
- Provide more opportunities for the students to learn for themselves, without just providing them with everything.
- Only talk as much as you need to and leave most of the investigative discussions to the class
- Plan more hands on activities rather than lecturing us. Or at least involve us into a conversation.

Adapted from Wiggins (2014).

While these responses are in line with the principles and practices of PBL, it is important to note that foreign language students and faculty, both, are not always supportive of these kinds of activities and, more generally, of PBL (Gibbes & Carson (2013). We will return to this issue later in Chapter 6, where we address several well-placed concerns of language teachers. Other findings from Wiggins (2014) offer a cautionary tale for the field of foreign languages. Among school subjects, world languages rank relatively low, in terms of being a favorite subject as well as being intellectually challenging. Science, math, English, and history rank much higher on both counts. These findings are a warning sign in the already inauspicious landscape of foreign language education in the U.S., which is characterized by a declining share of schools at the K-12 level that offer world languages (Pufahl & Rhodes, 2011; Fee, Rhodes, & Wiley, 2014), and declining enrollments at the post-secondary level (Looney & Lusin, 2018).

What, if anything can be done to address this situation? PBL can help by making language learning more engaging and relevant to real life, as well as by equipping students to do more with their acquired skills. We illustrate these benefits next, using a real project (henceforth, "the CV-project") from a HL class. In considering this project, it is important to remember that it was designed for college students and so it is not well suited to other instructional levels, as is. However, adaptations for other grade levels, and more importantly general strategies for adapting projects, will be discussed the end of this chapter, as well as at other points in this book.

Crucially, the discussion that follows is not intended to provide a project that is universally appropriate for all learners, but rather to lay the foundations of project design in its most general terms and illustrate the potential of PBL to make language learning engaging and relevant.

The CV project

The CV project comes from Maria Carreira's class, *Spanish for the Professions*. This is 300-level class is the first in a sequence of five courses leading to a Certificate in Professional Spanish awarded to HLLs by the Spanish Program at California State University, Long Beach. *Spanish for the Professions* aims to acquaint HLLs with general professional-level language and the vocabulary of their field of study or intended career, as well as skills that support independent language learning. As is typical with HLLs, the students in this class have fairly strong oral skills: most are in the intermediate–high to Advance-mid levels of the ACTFL oral proficiency levels (OPI). Their writing skills however, are lower, for the most part, in the Intermediate-low to -mid levels.

Subsequent courses in the certificate focus on more field-specific preparation and include *Spanish for Business*, *Spanish for the Health Professions*, *Spanish for Legal Interpretation, Spanish for Bilingual Teachers*, etc. Additional courses for the certificate come from the curriculum for Spanish majors, including linguistics, culture, and literature courses. The majority of students seeking the certificate however, are not Spanish majors, but Latinos who want to use their bilingual and

bicultural skills in a professional setting. Upon completing the required coursework, students take a proficiency examination by Avant Assessment, a company that specializes in evaluating functional proficiency, and their score is recorded in their certificate.

Spanish for the Professions combines PBL and traditional language instruction. The class meets two days a week, for 90 minutes at a time. Thursdays are designated days for project work, leaving Tuesdays for more traditional language learning activities, such as studying vocabulary, grammar, and orthography. However, far from being separated, these topics are folded into the creation of the four products that comprise the CV project: a CV or résumé, a cover letter, a mock job interview, and a video-resumé, i.e. a short recording used by a candidate to apply for a job. Together these products support the aforementioned course objectives and, more widely, the goals of the certificate.

During the first week of the semester, students group by their field of study or intended career. Typically, these fall into five general categories: healthcare, business, education, translation/interpretation, and the law. Ideally, groups consist of four students, though sometimes it's necessary to form slightly smaller or larger groups. These professional categories are general enough that they can accommodate the formation various sub-groups, with different specialties, if needed. Also during the first week of the semester, the rules of group work are specified and agreed to by every student and some training is provided on how to respond to problems that arise in collaborative learning situations, such as what to do with group members that are not pulling their weight or when the expectations and procedures for group work are

unclear (Gibbes & Carson, 2013, Notari, 2014). However, as we will discuss in chapters to come, the challenges of group work are such that they cannot be properly addressed in one day, but require ongoing attention and the use of intentional strategies on the part of teachers.

How project work is structured

In keeping with a best practice of PBL, a great deal of the work on the products is done in class, more specifically, in the language lab, as technology is a necessary tool for finding resources and information. Chief among those resources are authentic models in Spanish of each of the four products that will be created. Following a genre-based approach to writing, students familiarize themselves with the conventions of each of the target genres by carefully studying these models (Hyland, 2003). The CV, the most linguistically accessible of the three products, is completed first and serves to scaffold the cover letter. These two then scaffold the mock job interview, which is the most linguistically challenging product. The video-resumé, the last of the products, is done independently by students and turned in lieu of a final exam. Thus, the creation of the products proceeds from simplest to hardest and from collaborative and guided to self-directed and independent.

Though genre-based writing per se is not a core feature of PBL, it connects well with a common approach for organizing project work around three steps, namely, information gathering, processing, and reporting (Stoller, 2014). The principal activity during the information-gathering phase involves collecting sample models of

each of the products in Spanish. Working in groups, students search the web for such samples and store them in a virtual resource center, i.e. a folder in Google docs that is shared by all members of a group. Also in this center are additional resources, such as advice columns by career counselors on how to write a good CV.

Next, the information-processing phase starts out by whittling down the number of collected samples, keeping those that will be most useful for students in particular fields. To this end, students develop criteria for evaluating the quality and usefulness of the different sample CVs collected. These criteria inform the co-creation of rubrics in class. Also during this phase students spend a considerable amount of time studying the language and format of the authentic products, with the understanding that they will be appropriating relevant features to create high quality products that respond to their particular interests and needs (Canagarajah, 2007). In the process, students grapple with questions such as the following:

1. Should titles such as "California State University" be translated into Spanish? Typically, students seeking international jobs opt for a translated title – e.g. Universidad Estatal de California en Long Beach - whereas those looking to work locally keep the English title.

2. Where dialectal variants exist, which one would be most appropriate to use. Again, students seeking international jobs may opt for the standard term that is most widely accepted, whereas those looking for local jobs or jobs in a specific geographic location may opt for other variants.

3. What to do when English and Spanish diverge significantly with regard to some feature of the target product (for example the sequential structure of a

cover letter)? Again, students come to understand that the intended use of the product will determine the best course of action.

Consideration of these and other issues support the development of cross-linguistic awareness as well as academic efficacy.

The work plan

Being a semester course, *Spanish for the Professions* consists of fifteen weeks of instruction plus an additional meeting for the final. As previously noted, the first Thursday of instruction is used to group students by their field of interest and provide training on collaborative learning/group work. The next two Thursdays (i.e. weeks 2 and 3), are dedicated to participating in reading circles by field of study, as well as working individually on a preliminary professional profile – i.e. a concise and eye-catching statement of their strengths. For reading circles, students take turns finding reading material for the group and leading a discussion. This material can range from trade journal articles, to course descriptions from university websites from the Spanish-speaking world, to job listings. Intended as an entry event, this work serves to acquaint students with valuable resources in the target language and to get them thinking about their careers. Students will draw on these resources and expand on them for the semester-long process of revising and fine-tuning their professional profile. To this end, they will consider their professional goals, the skills that they already posses that can be leveraged for reaching those goals, as well as the skills they will need to develop to become more competitive. This profile will anchor the creation of all the products, rendering coherence to their professional portfolio.

The remaining twelve Thursdays plus the day of the final are set aside for project work, four classes for the CV and the cover letter each, and five for the job interview. This work can range from peer editing personal statements prepared as homework, to copying useful labels and vocabulary from the CVs collected by each group, to individual reflections on the process of crafting a professional profile. Students turn in this work at the end of class in the form an "exit card", which is reviewed by the instructor, assigned a grade, and returned with constructive feedback.

Thus, exit cards serve several interconnected functions in *Spanish for the Professions*, and, more generally, in the model of PBL developed in this book. First, they hold students accountable for the work they do in class. Second, they provide a rigorous and instructionally coherent way to assign class participation grades: students receive points for advancing their project, as opposed to for just being in class. Third, exit cards provide incremental feedback to students on a piece of their work, thereby enacting a cycle of critique and revision. This best practice of PBL is essential in highly diverse classes (a feature of classes with HL learners) in that it supports learner-centered/differentiated instruction. And finally, when gathered together, exit cards comprise a roadmap of the steps involved in creating each of the products. As explained by Rinaldi (1994), this documentation process supports reflection and the integration of learning.

> documentation is not only the process of gathering evidence and artifacts, but also a physical collection of evidence and artifacts, the reflection on and analysis of the collection, and the presentation of that collection, or part of it,

in a way that makes children's learning visible to the children, to the teachers, to other adults including families and visitors. (p. 2)

For readers seeking further details on the CV project, a week-by-week work plan is included in the appendix to this chapter.

Essential elements of PBL

Gold Standard PBL is a comprehensive, research-based model for teachers developed by PBLworks. At the center of this model is the development of key knowledge, understanding, and success skills, including 21st Century skills such as collaboration, skilled communication, real world problem solving, critical thinking, and use of technology for learning.

Seven essential elements support these learning objectives, namely: (1) sustained inquiry, (2) authenticity, (3) student voice and choice, (4) reflection, (5) critique and revision, (6) public product, and (7) a challenging problem. Each of these elements is examined below, starting with a description from PBLworks, followed by an explanation of how these elements are instantiated in the CV project.

(1) Sustained inquiry

> *The project involves an active, in-depth process over time, in which students generate questions, find and use resources, ask further questions, and develop their own answers.*

(https://www.bie.org/object/document/pbl_essential_elements_checklist).

How sustained inquiry is instantiated in the CV project:

The development of the four products extends over the semester and engages students in answering questions such as: What are some defining language features of each type of product – i.e., sentence structure, common phrases, and vocabulary? How is each product organized or structured? How can I best present myself to potential employers through the four products developed in this class?

(2) *Authenticity*

> *The project has a real-world context, uses real-world processes, tools, and quality standards, makes a real impact, and/or is connected to students' own concerns, interests, and identities*

(https://www.bie.org/object/document/pbl_essential_elements_checklist).

How it is instantiated in the CV project:

The project addresses the goals of the students in pursuing the Certificate in Professional Spanish in that it introduces them to the language of their professional field and helps them develop a portfolio using real-world processes, such as copying authentic models and researching information on the Internet.

Larmer (2012) describes a variety of ways that a project can be authentic, as follows.

a. It meets a real need in the world beyond the classroom or the products students create are used by real people.
b. It focuses on a problem or an issue or topic that is relevant to students' lives—the more directly, the better—or on a problem or issue that is actually being faced by adults in the world students will soon enter.
c. It sets up a scenario or simulation that is realistic, even if it is fictitious.

d. It involves tools, tasks, standards, or processes used by adults in real settings and by professionals in the workplace.

https://www.bie.org/blog/3_tips_for_planning_authentic_pbl_projects [direct citation]

While the CV project meets all of the above criteria, projects need not do so to be considered authentic. As Larmer (2012) points out, there is a sliding scale of authenticity of projects, from not authentic at all, to somewhat authentic, to fully authentic. The aim is to get as close as possible to fully authentic, within the constraints of the teaching context. Also, it is helpful to remember that the notion of "real world" encompasses not only contexts external to the school, but also ones within it. This means that an authentic project in the target language might involve such topics as how to improve offerings in the school cafeteria, and activities such as studying the college application process or building on the work accomplished in another class.

(3) *Student voice and choice*

> *The project allows students to make some choices about the products they create, how they work, and how they use their time, guided by the teacher and depending on their age and PBL experience.*

(https://www.bie.org/object/document/pbl_essential_elements_checklist).

How it is instantiated in the CV project:

As students collect and process information on their field of interest and work collaboratively with other students, they reflect on their personal and professional strengths as well as their goals and priorities. On the basis of this, they decide how they will present themselves to potential employers through the four products.

(4) *Reflection*

The project provides opportunities for students to reflect on what and how they are learning, and on the project's design and implementation.

(https://www.bie.org/object/document/pbl_essential_elements_checklist

How it is instantiated in the CV project:

As explained earlier, at the core of the project is the professional profile, which anchors and guides the creation of all products. As students create this piece of the project they reflect on how they want to be perceived professionally and strategize to ensure that the other products are consistent in this regard.

Also supporting reflection are exit cards. A prompt along these lines might be: How will you organize or order the different components of your CV (i.e. experience, education, skills, etc.) to bring out your strengths and downplay your weaknesses? How did you decide on this particular ordering? These kinds of questions guide the design and implementation of products that are both fine-tuned to individual learners and high quality, as measured by real-world standards.

(5) *Critique and revision*

The project includes processes for students to give and receive feedback on their work, in order to revise their ideas and products or conduct further inquiry.

How it is instantiated in the CV project:

Group work and exit cards support cycles of critique and revision. Through group work, students to deliver and receive constructive feedback on their work and exit cards offer ongoing, incremental feedback from the instructor and opportunities for revision.

(6) *Public product*

The project requires students to demonstrate what they learn by creating a product that is presented or offered to people beyond the classroom.

How it is instantiated in the CV project:

The CV and cover letter become part of a professional portfolio, which students can present to potential employees, as is, or revised after subsequent coursework.

(7) *A challenging problem*

The project is based on a meaningful problem to solve or a question to answer, at the appropriate level of challenge for students, which is operationalized by an open-ended, engaging driving question.

How it is instantiated in the CV project:

Several challenging, open-ended questions guide the creation of the four products by students, for instance: What are the strengths and weakness in my academic training, linguistic skills, and life experiences? How should I deal with these when presenting myself to potential employers? Specific to the target language, students identify knowledge gaps and enact strategies for working through them during the information gathering, processing, and presenting stages.

PBL and language learning

Fredricka Stoller's review of the research on PBL and language learning, lists the benefits below. The first four of these, which connect directly to language learning, will be the focus of this discussion, particularly as they relate to HLLs. The remaining benefits relate to the development of key knowledge, understanding, and success skills. Since these have already been discussed to varying degrees, our comments will be very brief.

1. Authenticity of experience and language
2. Intensity of motivation, involvement, engagement, participation, enjoyment, creativity;
3. Improved confidence, sense of self, self-esteem, attitude toward learning, comfort using language, satisfaction with achievement;

4. Enhanced language skills, repeated opportunities for output, modified input, and negotiated meaning; purposeful opportunities for an integrated focus on form and other aspects of language;

5. Improved abilities to function in a group (including social, cooperative and collaborative skills)

6. Increased content knowledge

7. Increase autonomy, independence, self-initiation, and willingness to take responsibility for learning.

8. Improved abilities to make decisions, be analytical, think critically, solve problems.

(Stoller, 2006; p. 25)

Turning to the first benefit, it is helpful to think of authenticity in language learning as consisting of two interrelated components, one pertaining to language, in particular, to promoting real-world language use in the classroom, and the other pertaining to facilitating student dispositions that are conducive to learning, such as, for instance, motivation, engagement, enjoyment, etc.

Supporting real-world language use in the classroom turns out to be a tricky proposition. At the heart of the problem is the fact that the classroom context is fixed with regard to the participants (the students and the instructor) and the setting (the physical setting of learning) (Van Patten, 2017). This limits what can be done in terms of achieving real world communication within the confines of the classroom. As Bill Van Patten puts it: "students aren't restaurant customers. They aren't tourists

needing help getting from point A to point B" (p. 16). As a result, tasks that engage students in assuming such roles are neither authentic nor communicative, though they may serve a purpose, such as providing opportunities to negotiate meaning and practice a particular feature of language.

The problem of authenticity finds a surprisingly satisfying and straightforward resolution in PBL because, by design, projects apply real-world processes to a real-world challenge. Taking the CV project by way of example, the creation of the products follows real-world processes and practices such as consulting authentic materials, modeling exemplars, rehearsing difficult parts of the interview, running different ideas by friends, etc. Crucially, the process itself is infused with authenticity. But what about the products: are they all that authentic? The truth of the matter is that most job candidates in the United States will never be asked to submit a CV or a cover letter in Spanish, even for jobs that call for knowledge of this language. On the other hand, job applicants can expect to be interviewed in Spanish. This connects the mock job interview to a real-world experience and, by extension, makes the CV and cover letter valuable preparation for that experience.

A sure way to boost real-world language use in the classroom is through the inclusion of speakers of the target language from the outside world. In non-PBL classes, this frequently involves engaging with guest speakers, e.g. listening to a presentation and posing questions. Taking it to the next level, in PBL classes, students actually work with speakers of the target language to address the driving question of their project. Paraphrasing Bill Van Patten's earlier cited comment: in PBL students don't have to pretend to be restaurants customers; they can actually visit a real

restaurant and communicate with workers or patrons in the target language in a purposeful manner. In this way, PBLL transcends the problem of the fixed classroom context.

With respect to student dispositions, authenticity is an essential piece of teaching for motivation, engagement, and the other elements of Stoller's second benefit. Specific to HL teaching and learning, a study by Kim Helmer of a Spanish HL class in a Southwest charter high school, learners rejected activities that they perceived as serving no other purpose than to practice grammar. Appropriately titled, *"It's not real, it's just a story to learn Spanish,"* this study underscores the importance of "meaningful activity and authentic materials that connect the curriculum to students' linguistic strengths, target-culture knowledge, and the communities from which they came" (186). In this view, the role of communities is to provide authentic venues in which to apply language beyond the classroom, allowing instructors to replace language-focused instruction that fails to motivate HLLs with opportunities for realistic engagement.

In a model of student engagement by Phillip Schlecty, the student behavior described by Helmer corresponds to "rebellion", a constellation of actions associated with one of five ways that students can respond to a learning task. Rebellion, the least productive of responses in this model, is characterized by the refusal to do assigned work, acting disruptive, and attempting to substitute alternative activities (Schlecty, 2011). At the opposite end of rebellion is "engagement", which is characterized by students that (1) are focused on the work being done, (2) voluntarily commit to completing this work, (3) persist in the face of difficulty, and (4) perceive the work as

personally meaningful (Schlechty, 2011 p. 9). In between engagement and rebellion lie strategic compliance, where learning is driven by instrumental goals, ritual compliance, where the focus is on doing the minimum or getting by, and retreatism, which is characterized by student disengagement and withdrawal.

Six design qualities in Schlechty's framework are associated with engagement, including, as listed below, authenticity. Also worth noting are the significant commonalities between the six design qualities in this framework and the elements of Gold Standard PBL.

- **Product Focus**: Learning is linked to the creation a product of personal value to students.
- **Affirmation of Performance:** The product has value and is visible to others beyond the context of the classroom.
- **Affiliation**: Students have the opportunity to work with peers as well as individuals outside the classroom, such as parents, community members, experts, etc
- **Novelty and Variety**: Students access a wide range of media and learning approaches to complete the learning tasks.
- **Choice**, Students have a say as to what they learn or how they learn what is expected;
- **Authenticity**: Students engage in tasks that are of interest to them.

Regarding the third of Stoller's benefits, it is important to remember that many HLLs have deep-seated linguistic insecurities resulting, in large part from the criticism they face from native speakers and, in some cases, language teachers. As such, improving HLLs' linguistic confidence, sense of self, comfort using their home language, etc. is a top priority of HL instruction. Projects with an experiential component prove invaluable in this regard by giving students the opportunity to put their language and cultural skills to the service of others in a real world setting.

Among the experiential learning options, one that is particularly well suited to HLLs is *placed-based learning*, an approach to learning that is rooted in the local community. A project of this type might involve working with a community organization to create a public service announcement in the target language on a health issue of particular relevance to the HL community and disseminating the product in local churches, schools, community centers, etc.

Turning to the fourth benefit, the CV project is structured around successive cycles of input-oriented tasks, where students work with existing language, followed by output-oriented ones, where they produce language. During the input-oriented tasks students unpack the forms, functions and features of the authentic products they have collected. Then, at the output-oriented stage, they apply this information to the creation of their products.

The four skills (listening, speaking, reading, writing), as well as the three modes of communication (interpersonal, interpretive, and presentational) are all integrated in the process. For example, at the input phase, interpersonal communication in the way of group discussions support the analysis of the sample products, while at the output phase, interpersonal communication supports various cycles of peer editing and instructor feedback on the products. In line with Stoller's fifth benefit, this approach supports the development of abilities associated with group work. It also aligns with our current understanding of how input and negotiation of meaning drive language learning. This described by Bill Van Patten below:

"A goal of contemporary language teaching is to move away from trying to teach language explicitly and instead to recognize that language emerges and develops over time in the learner's mind/brain…we should take the fundamental role of input and communication as the centerpiece of the language learning/teaching enterprise and create curricula reflective of them ((2017, p. 68).

Finally, consolidating the remaining benefits described by Stoller, the textbox below illustrates how PBL develops content knowledge, learner autonomy, and critical thinking skills. This vignette comes from another course in the Certificate in Professional Spanish and illustrates how students learn to make linguistic choices taking into consideration factors that go beyond the strictly linguistic. The situation brings to mind Halliday's observation that "the system of available options is the 'grammar' of the language, and the speaker, or writer, selects within the system: not in vacuo, but in the context of speech situations *(174).*

In an HL class, groups of students compete to present something amazing about their field of study or an area of interest. The group preparing a class presentation on medical technology struggled with what to do about three key terms that were not likely to familiar to their peers in other fields of study: hitos (milestones), dispositivo (device), and diálisis (dialysis). After some back and forth, the students decided to use their slides to instantiate three different solutions. For the first word, an English translation was given in parenthesis – i.e.

Hitos (milestones) - reasoning that this was the most effective way to convey its meaning. For the second word, a Spanish synonym was provided in parenthesis - i.e. Dispositivo (mecanismo) - on the grounds that this cognate would effectively convey the meaning of the term without the need to resort to English, which they felt would disrupt the follow of a presentation in Spanish. Finally, for "diálisis" - one of the advances that they wanted to showcase in their presentation – the students settled on providing a full explanation in Spanish of its workings, even though its English cognate was obvious. The reasoning here was that without an in-depth understanding of what this treatment actually does, the class would not fully appreciate its miraculous nature, which would defeat the purpose of the presentation.

To close this chapter, we consider how the CV project can be adapted for different student populations.

Adaptations of the CV project

The old question, "what do you want to be when you grow up", is as much a favorite of the adults that pose it as of the children that ponder it. This makes the professions an excellent theme for projects in K-12, even if the products of the CV-project (the cv, cover letter, job interview and video-resumé) and its driving question (how to best present oneself to a potential employer) are not appropriate for young learners. Crucially, distinguishing between the elements of project design, in particular, the theme, driving question, and product, is a good starting point for

adapting existing projects to different populations of learners and instructional contexts.

For example, keeping the theme of the professions and focusing on young learners, a project might involve finding answers to the driving question "what do _____ (firefighters, police officers, doctors, engineers, pilots, scientists, lawyers, etc.) do"? Products can include posters that displayed in the school with phrases that answer this question, a job fair where students answer this question pretending to be professionals from their career of interest, for very young learners with minimal writing skills, a collage of pictures of professionals doing their work.

For high-school students, a driving question might be "how do I prepare for life after high school?" and products might include one or more of the following: a checklist of actions and resources that support such preparation; an afterschool forum where invited speakers, students and parents discuss key issues; or an essay written by each student laying out their dreams for their future and plans for achieving them.

What about discarding the theme of professions, but keeping some other elements of the CV-project, such as the video-resumé? In conjunction with other products such as an autobiographical essay and a family tree, the video-resumé can be a piece of a project with the driving questions: Who am I? What are the different ways that I can present myself to the world and how do these ways vary depending on my communicative intent?

The larger point here is that to respond to the needs of students, careful consideration must be given to each the elements of a project in isolation, as well as

in combination. In language classes, this is particularly important when it comes to products, which should be at just the right level of difficulty to support learning and engagement. We will return to topic in Chapter 3 as we examine the strategies for selecting, scaffolding, and assessing products.

Taking stock of what we've learned

We started this chapter with the caveat that adopting PBL requires some openness to trying new ways of doing things and by way of making this point listed some of the most significant ways in which this approach diverges from some common practices of language teaching. Along the way, we have tried to make the case for why PBL is well worth the effort, showcasing, in particular, the benefits associated with using authentic language with a real-world purpose when teaching HLLs. This population is the focus of the next chapter, where we present the best practices of HL teaching, connecting them to PBL and addressing specific problems of practice.

By way of summary of this chapter and in preparation of work to come, we present two instructional tools in the activities that follow. These are valuable tools in all teaching situations, but particularly so in PBL-focused classes. The KWL chart is a graphic organizer that helps students activate prior knowledge, think about their learning needs with respect to a topic of instruction, and plan ahead for future learning. The text-to-self connection encourages student engagement through personal connections with a text or other aspect of instruction. Both of these activities

can be used in PBL classes to promote sustained inquiry, reflection, student choice, and critique and revision, as well as to support learner-centered instruction.

1. Complete this KWL chart before reading this chapter.

What do I <u>know</u> about PBL?	What do I <u>want</u> to learn about PBL?

Complete this KWL chart after reading this chapter. What did you learn from this activity?

What did I think I know about PBL, but in retrospect now realize that I did not know all that well? Or What did I forget to put include in my initial list of things I knew about PBL?	What do I still need to learn about PBL? Or what is a point that remains unclear to me?

2. The text-to-self connection

Pick out a concept or a statement from this chapter that caught your attention and explain its significance to you or how it relates to answer you gave to the KWL chart above.

Appendix

For instructors interested in the CV project, Tables I and II give timelines, activities, and assessments for the CV and job interview, respectively. No table is provided for the cover letter because it follows a similar timeline and process to that of the CV.

Table I

CV Total time: 4 classes 1 class = 2 hours	
Information gathering	Class 1: As homework, each student collects 5-7 authentic CVs from the internet and puts them in his/her groups' resource center. At the start of class, the instructor leads a discussion of what makes a good sample CV for purposes of the class. On the basis of this discussion, a rubric for creating and evaluating CV is co-constructed by the class. Building on this activity, students work in groups, to select the 10-12 CVs from their center that are best suited to their specific needs and which they will work with as they create their CVs. Each student receives a grade for the CVs they posted ahead of class and the group receives a grade for their work done in class selecting the best CVs to work with.
Information processing	Class 2: In preparation for this class, each student finds an article in the target language with suggestions about how to organize a CV and posts it in the center. In class, each group selects one or two suggestions for how to organize their CV and shares it with the class. Also, students work in groups to pick out useful headings, verbs, and adjectives from the selected CVs, which they turn in for a participation grade. Once again, a group grade is assigned for work

	done in class, as well as an individual grade for the work done outside of class.
Information presenting	Class 3: In preparation for class, students write a first draft of their CV using the list of language points developed in the previous class. In class, they edit each other's work and turn in a new version of their CV. This exit card is edited and assigned an individual grade by the instructor. Class 4: Students incorporate the feedback from the instructor and they edit each other's second draft before turning it in at the end of class for an individual grade. Students receive a final round of feedback from the instructor on this draft, which they use to create the final version of their CV.

Table II

The mock job interview Total time: 5 classes	
Information gathering	Class 1: The class watches a video of a job interview and discusses the format of the interview, specific expressions and vocabulary used, as well as the type of questions and answers involved.
Information processing	Class 2: In preparation for class, students review a list 30 questions provided by the instructor that they will need to prepare for their interview. During the first hour of class, students work in their groups on answers to the more difficult ones, such as "What is your biggest weakness" or "Why should we hire you given that you have no experience?" During the second hour, the class debates the merits of the answers proposed by the different groups.
Presenting	Class 3: Working in small groups, students practice interviewing each other. Class 4 + 5: Mock interviews are conducted.

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