Figure 6.6 The Interconnectedness of Project-Based Learning and the 14 Parameters		
Parameter	Links	
Parameter 2: Embedded Knowledgeable Other	 Instructional coaches are important for schools implementing Project-Based Learning. They provide feedback on the nonnegotiables of Project-Based Learning. 	
	 Staff need support in project design to avoid common pitfalls like creating "dessert style" projects (learning is first then the project). Project-Based Learning should have the learning embedded through the entire project. 	
	 Staff need support in instructional practices. This is in situ support to implement appropriate collaborative discussion protocols, manage group work (specifically, accountability for all members), assessment for and as learning (Chapter 4), and fidelity to the inquiry process. 	
	 The gradual release and acceptance of responsibility is essential in scaffolding the learning of subject content and skills within the project. The co-teaching environment allows for the instructional coach to model effective protocols for both teachers and students. 	
	 Effective implementation of Project-Based Learning is often within a co-teaching environment. This affords one teacher the opportunity to facilitate guided workshops, while the other teacher facilitates collaborative and independent work on the project. 	
Parameter 3: Daily Sustained Focus on Assessment and Instruction	 It is very difficult to undertake Project-Based Learning without having a minimum 100 minutes of instructional time. 	
	• It is common practice for the teacher to start the lesson with the "need to know" list, and the class will identify a need to know in order for them to progress in a project. This is deconstructed as the Learning Intention and appropriate SC are co-constructed (the SC are used as an assessment measure to move a "need to know" to a "know"). This is paramount to the inquiry process. Without this process, you will not achieve deep inquiry with the opportunity for students to transfer knowledge and skills.	

(Continued)

Figure 6.6 (Continued)		
Parameter	Links	
	 Assessment for and as learning (Chapter 4) is imperative in the inquiry process. Teachers need to be collecting data on individual students within small and whole class groups. This collected data will often inform the instructional workshops (mini lessons) that are provided to students throughout the lessons/unit of study. 	
	 Resources such as pacing charts, group portfolios, progress checks, etc., are used to support this process of using SC. 	
Parameter 4: Principal as Learning Leader	 This is key as many students don't enjoy working with other students, especially if accountability is maximized. The principal needs to have very strong understanding of the impact of the collaborative processes within a Project-Based Learning classroom to ensure fidelity to the model is maintained as all stakeholders (students, parents, and staff) learn new skill sets. 	
	 Furthermore, this could be a new instructional process for staff. They need time for project planning and in situ feedback on their implementation of student-centered practices. 	
Parameter 5: Early and Ongoing Intervention	 Teachers must observe and monitor the ongoing work, assessing as they do for opportunities to differentiate and bring assistance to those who require it, perhaps at a guided problem-solving table. 	
Parameter 6: Data Walls and Case Management Meetings	Data Walls and Case Management Meetings are implemented in this whole-school approach to CI.	
Parameter 7: Job-Embedded Professional Learning	 Teachers need ongoing, in situ Professional Learning that addresses how to manage the collaborative environment to ensure all students are accountable (e.g., grouping strategies, group contracts) 	

Parameter	Links
	 manage the inquiry process (e.g., need to know, instructional workshops, mini lessons, use of explicit instruction) use assessment for and as learning and final evaluation of learning in Project-Based Learning. Specifically, how to benchmark the learning with appropriate assessment for and as learning strategies, including Descriptive Feedback to ensure the projects are managed to achieve the identified subject curriculum expectations/outcomes
	 manage student demonstrations of learning (e.g., gallery walks, group presentations, peer assessment, presenting student work in authentic way)
Parameter 8: Collaborative Assessment of Student Work	No similar commentary
Parameter 9: Centralized Resource Rooms	
Parameter 10: Budget for "Just Right Resources"	
Parameter 12: Parent and Community Involvement	 The authenticity of a project, from which "wicked questions" are drawn, is very important. Often parents and the local community members provide stimulating, authentic links. Some schools create a parent occupation database to link parent expertise with student team projects. This also allows parents to gain a greater understanding of the different learning processes.
in Supporting All Students' Achievement	 Meaningful partnerships with the local community members provide students with relevance in what they are learning beyond the classroom.

(Continued)

Figure 6.6 (Continued)		
Parameter	Links	
Parameter 13: Appropriate Literacy Instruction in All Areas of the Curriculum	 Effective Project-Based Learning has a range of selected literacy strategies identified at the start of the project and are modeled and scaffolded to allow students/groups access to the curriculum content. These are key factors in project design and ensure the learning experience is rigorous. 	
Parameter 14: Shared Responsibility & Accountability	 A network or Professional Learning Community (PLC) approach to Project-Based Learning is imperative as the opportunity to share resources (projects and protocols) ensures the ongoing sustainability of the change in instructional approach. The PLC approach has been used in many successful implementations, where schools or systems share the responsibility of increasing student academic achievement and are mutually accountable to each other to ensure Project-Based Learning is feasible and sustainable. Accelerated leadership capacity is gained by teachers who ascend to the roles of instructional leaders across a system. They have many opportunities to see a range of different implementation processes across different 	
	 Stages and key learning areas and share their learning across the system. Collaborative dialogue across schools affords leaders the opportunity to share and to support each other in setting strategic directions and resourcing changes in instructional practices. This highlights the importance of Learning Walks and Talks, where there is a consistent focus and understanding of what the learning looks like in a Project-Based Learning classroom. As a result, all leaders are precise in what they are looking for in a student-centered learning environment and can provide Descriptive Feedback regarding the effectiveness of classroom instruction. 	

Source: Gavin Hays, learning leader, personal communication, 2017.