International School of Billund

Pedagogy of Play Study Group Guide

Playful Participatory Research for Teacher Researchers

2020

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Pedagogy of Play is a research collaboration between the LEGO Foundation and Project Zero, launched in 2015 at ISB and expanded to additional sites.

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Welcome to Pedagogy of Play Study Groups

Welcome to the Pedagogy of Play (PoP) study groups at ISB! We hope that collaborating with your ISB colleagues and engaging in playful participatory research will be engaging, empowering, and joyful.

What is a PoP study group?

A study group is a small group of teacher-researchers who meet regularly to explore playful learning practice. Each study group is supported by a facilitator who plans and leads the sessions. As PoP study group members, you will actively investigate and influence the nature of learning through play at ISB. You will reflect on your own practice as well as further a school-wide understanding of what it means to place play at the heart of learning. The ideas, practices, and questions around learning through play that you explore may also inspire educators around the world.

You can also think of PoP study groups as professional development that builds a "community of practice" at ISB*. Communities of practice are groups of people who deepen their knowledge and expertise about issues of mutual interest or concern by regularly sharing questions, information, and insights. They discuss their needs and hopes, explore ideas, and help each other solve problems. These communities might develop shared understanding, and/or create frameworks or tools. Over time, they build a shared sense of identity and a common body of knowledge that reside both in the skills, understanding, and relationships of their members, and the tools, documents, and approaches they create. This work actively contributes to ISB's growth as a school.

Just like teaching, teacher research can be exciting and challenging, and it can push the boundaries of your comfort zones. At the end of the year, we hope you feel you have learned and grown as an individual teacher and as part of something bigger than yourself. Knowledge-building is a team sport! If you have a question or concern, ask your colleagues for assistance.

Pedagogy of Play at ISB

Pedagogy of Play is a research collaboration between the *LEGO Foundation* and *Project Zero*, a research organization at the Harvard Graduate School of Education. The project launched in Denmark in 2015 with participatory research at ISB.

Since then, we have been researching what it means to put learning through play at the centre of school. PoP research has also expanded to other sites (see *www.pz.harvard.edu/projects/pedagogy-of-play* for more information). The Indicators of Playful Learning, the creation of *Passion Day*, the Middle Years Programme (MYP) *Student Composed Schedule*, strategies for playful classroom management, ideas about when to say yes to play, and the Afterschool Club (ASC) student licensing program in the Creator Space are all examples of PoP work at ISB.

* Wenger, E., McDermott, R. A., & Snyder, W. (2002). *Cultivating communities of practice: A guide to managing knowledge.* Harvard Business Press.

The Nature of Study Groups

Why Study Groups?

The work of study groups is central to the mission and vision of ISB where play is a *core approach to learning and to life*, for students AND for teachers. In study groups teachers learn through play — engaging with colleagues through asking questions, imagining possibilities, experimenting with new practices, and working through challenges. They are places where it is okay to say, "I have a new idea"; "I don't know"; "I would like to change something"; and to ask, "What if....?" All of this has a positive impact on teacher and student learning and engagement. One might think of the work of study groups as embodying the ISB playful learner profile:

> *We embrace a playful mindset, finding opportunities to experience choice, wonder, and delight in our learning. We think creatively, experiment with new ideas, learn from mistakes, reflect, and try again. We find joy in belonging to a playful community where we learn from and with one another.*

Incorporating play into school is not easy. For instance, in play children are in charge, but at school, the adults set the agenda; play involves taking risks, but in school, children should be safe. Study groups provide a supportive place to explore inherent tensions or paradoxes between the nature of play and the nature of school.

How Study Groups Work

Study group work contributes to an individual and collective understanding of what it means to learn through play at ISB; the work is an important part of the continued development of ISB. As such, study group members are assigned hours for their work. Individually, in teams, or as a whole group, study group members conduct their research by engaging in an inquiry process that includes:

1. **Developing a research question** about learning through play.
2. **Gathering documentation** from their regular teaching practice (collecting data such as video and audio recordings, photographs, samples of children's work, and transcripts of classroom conversations).
3. **Sharing documentation** with each other, interpreting it in relation to the documenter(s)' question.
4. **Making connections** between the documenter(s)' work and one's own practice.
5. **Planning next steps** for teaching, learning, and data collection.
6. **Sharing findings** beyond the study group.

Like any skill, engaging in the inquiry process takes practice. For more details about the inquiry process, see *Being a PoP Teacher-Researcher* on page *16* and *Frequently Asked Questions* on page *80*.

What Might a Study Group Year Look Like?

The calendar below provides an example of what a study group trajectory may look like over the course of a given year.

AUG

- Facilitators check in individually with each study group member

SEP

- Study Group Session 1
- Welcome
- Introduction to/reminder of documentation and inquiry cycle
- Begin to think about a research question
- Set up norms
- Decide on a group name
- Begin documenting
- Whole-school professional development day to share PoP ideas

OCT

- Study Group Session 2
- Continue developing a research question (see *Developing a Research Question* on page *18*)
- Look at documentation
- Read *Being a PoP Teacher-Researcher* on page *16*
- Continue documenting

NOV

- Study Group Session 3
- Continue developing research questions as needed
- Look at documentation
- Continue documenting
- Whole-school professional development day to share PoP ideas

DEC

- Facilitators check in individually with study group members to discuss research question and review documentation together

JAN

- Study Group Session 4
- Begin developing hypotheses about research questions
- Look at documentation
- Continue documenting

FEB

- Study Group Session 5
- Continue developing hypotheses about research questions
- *Taking Stock of Your Research* study group activity (see page 20)
- Begin discussing what to share at May Celebration
- Look at documentation
- Continue documenting

MAR

- Study Group Session 6
- Continue developing hypotheses about research questions
- Decide what to share at May Celebration
- Look at documentation
- Continue documenting
- Whole-school professional development day to share PoP ideas

APR

- Study Group Session 7
- Prepare for May Celebration
- Look at documentation

MAY

- Study Group Session 8
- Finish preparing for May Celebration
- Schoolwide May Celebration

JUN

- End of year reflections
  (thinking, musing, playing with "what if" thoughts about the next year)
- Facilitators meet to reflect and plan for next year

Please note that study groups' composition and ways of working may vary from division to division, and year to year, based on study group goals and school-wide requirements (such as the International Baccalaureate accreditation).

What Does It Mean to be a Pedagogy of Play Study Group Facilitator?

PoP study group facilitators guide small groups of teachers interested in exploring how to support learning through play at ISB, with the aim of improving overall student outcomes. The purpose of the study group is to contribute to the teachers' own knowledge about supporting playful learning in their practice as well as to a schoolwide "community of practice" and the development of a pedagogy of play more generally. Study group members might create a tool, write a PoP blog post, or develop a picture of practice. Study groups also share what they are learning with colleagues during select professional development days and in a whole-school celebration each spring.

Study group facilitators help facilitate teacher research. There are seven main components of the facilitator role:

1. **Forming and supporting a study group**
2. **Checking in with study group members**
3. **Drafting study group agendas**
4. **Preparing for meetings**
5. **Facilitating meetings**
6. **Planning and facilitating PoP Ins (weekly 45-minute work sessions)**
7. **Supporting the creation of collective knowledge that endures**
8. **Supporting yourselves as facilitators**

(For more detail on the teacher-researcher inquiry cycle, see *Being a PoP Teacher-Researcher* on page *16*. For an overview of the study group trajectory over the course of a year, see *What Might a Study Group Year Look Like?* on page 6.)

"Having the experience of working here plus having the research group and exposing myself to everyone else's knowledge and experience, I guess it has pushed me towards doing things differently."

Mario

1 Forming and supporting a study group

The Leadership Team, in consultation with division coordinators and study group facilitators, will determine the composition of study groups each year. In general, when setting up a study group, think about the size of the group (usually 5-7 members works well) and criteria for group membership (this depends on the purpose of the group). Possible membership criteria include: shared interest in a topic, similarity or diversity of grade level or subject matter, and variety of perspectives.

One of the first tasks of the group is to establish a set of group norms or "essential agreements." See *Forming Ground Rules* (page 39) and *Sample Group Norms* (page 40) for sample norms to consider. Another fun task is deciding on a group name. In the past, evocative or playful names like *Say Yes to the Mess* and *The Reflectors* have helped establish a group identity.

To support the study group, it is important to attend to the following:

- Decide on a digital platform for posting, sharing, and/or commenting on documentation.
- Decide on a way to keep track of the learning in the group. This might take the form of a rotating note-taker, a monthly online posting on Padlet or another digital platform, a recap of highlights at the beginning of each session, etc.
- Encourage study group members to team up to develop a question. This work can be challenging, and exchanging ideas with a colleague can be both fun and rewarding.
- Be on the lookout for an overarching group question that might encompass the individual or team questions.
- Occasionally check in with individual members (see below)

2 Checking in with study group members

In August, schedule a half-hour to talk individually with study group members about their interests, hopes, questions, and concerns related to learning through play and/or the study group. In December, hold another half-hour conversation with individual study group members (in lieu of a December study group) to check in about how things are going (what is going well, what could be changed, what are you learning, what questions remain, etc.). See *Questions for Study Group Member Check-ins* on page 46 for more information.

3 Drafting study group agendas

Study groups are usually held once a month for two hours from September-May (with the exception of December). Typically, study group agendas include some or all of the following components:

- Welcome and playful transition from the school-day to a more reflective setting
- A playful provocation related to learning through play (this is sometimes combined with the opening transition) and/or discussion of a relevant topic
- Looking in depth at one or two pieces of documentation, or looking more quickly at more pieces.
- Planning future documentation
- A final reflection

The first step in creating a study group agenda is to identify what the learning goals are. In addition to the welcome and playful transition, it can be helpful to start your agendas with the learning goals for the session, highlights from the last study group, and the plan for the next two hours.

See *Building a Study Group Agenda* (*page 32*) and *Sample Study Group Agendas* (page *34*) for a possible template for drafting an agenda and sample agendas. In one of the early study group sessions, ask participants to read and discuss the document, *Being a PoP Teacher-Researcher* document on page *16*. See *Discussion Protocols for Being a PoP Teacher Researcher* on page *28* for ideas about how to use the document in your study group.

4 Preparing for meetings

To prepare for study group meetings:

- Look back at the previous session's reflections to remind yourself of feedback, insights, and questions.
- Come up with a "playful provocation." (See *Ideas for Playful Provocations* on page 40 for more information).
- Consider introducing an outside resource (e.g., an article, book chapter, video, or Ted Talk; ISB colleagues with experience or expertise to share; an expert from the Lego Group, a Project Zero researcher, etc.). Feel free to email a Project Zero researcher for assistance in finding resources.
- Reserve a room and make sure it's on the relevant ISB calendars (e.g. Outlook). (Feel free to be creative about where to meet — e.g., outside, a café, a comfortable or novel space in the school, etc.).
- Prepare materials for the session (handouts, materials for playful provocations, PowerPoints, tech equipment, etc.).
- Make sure someone is bringing snacks and coffee.
- Make sure that you or another member of the group has a timer so you or someone else can keep track of time as needed. (A timer often comes in handy when people find it hard to stick to an agreed-upon time limit.)
- Talk to the person who will be bringing documentation to help them decide what to bring, how to share within the time constraints, and what their main question is, as well as the most relevant discussion format for their question (see *Approaches to Discussing Documentation* on page 41).
- Check in with study group members (in person or via email) to remind them about the session date, time, location, agenda and related preparation, and to see if anyone has questions.

5 Facilitating meetings

When facilitating meetings:

- See *Resources for Supporting Study Group Facilitators* starting on page 52 for general guidance on facilitation skills, providing feedback, and asking probing questions.
- When discussing documentation, ask members to refer to the documentation to back up interpretations they make.
- Reinforce the distinction between description and interpretation or judgment when asking group members to say what they see.
- Remember to leave room to hear from anyone who has not yet spoken at the end of each discussion.
- Rotate the role of note-taking. Consider using audio-recording as a back-up.

6 Planning & facilitating PoP Ins (weekly 45-minute work sessions)

PoP Ins are weekly 45-minute sessions in which study group members can plan, prepare, or discuss their documentation, or otherwise further their understanding of supporting playful learning. There are typically 3-5 PoP Ins between study group sessions. PoP Ins can be planned and led by study group facilitators or their designees. Identify a notetaker for each PoP In to summarize what you did, emerging insights or puzzles, and next steps. Below is one possible monthly PoP In cycle.

PoP In #1:

- Each person or team creates a documentation plan for the upcoming month
- Informal conversations about learning through play, research questions, or documentation strategies

PoP In's #2-3:

- Review, select, and upload or post documentation on a shared platform
- Informal conversations about learning through play, research questions, or documentation strategies

PoP In's #4-5:

- Finish uploading or posting documentation for the month
- Review and discuss colleagues' documentation

Other possible activities for PoP Ins include:

- Timely feedback about questions, possibilities, or challenges related to study group sessions or related topics
- Observe teaching and learning in other classrooms, perhaps with a focus on particular children or the classroom environment
- Talk with students about one or more aspects of learning through play

Groups may undertake only one or a couple of activities during a PoP In. Reserve the last 5 minutes of each Pop In for the notetaker to finish and post the notes.

"Being able to talk and listen and work together was playful also, just being able to say what you needed to and not really worry about if it was a dumb idea. It was just very open and supportive."

Rachel P

7 Supporting the creation of collective knowledge that endures

Although not every teacher at ISB will be a study group member, all are likely to be interested in what the study groups are learning. Each study group is also likely to be curious about what the others are exploring. Students, too, may be curious about what their teachers are researching (indeed, some of them might want to join in the research process!). Here are some ways to contribute to an ongoing, public, and shared body of knowledge:

- Once every one-two months, one study group might share an interesting or provocative question or insight about learning through play at the weekly PYP/MYP or whole group staff meeting
- Engage PoP Practitioner colleagues (those not in study groups), and perhaps students, in thinking through puzzles and challenges that come up in the course of your work. This could happen:
    - In the staff room
    - During team planning or other meetings
    - At whole-school assembly and/or in the classroom (share your teacher-researcher identities with children so they can see you as learners and researchers of playful learning)

Mid-year Staff Meeting or Professional Development Day: A mid-year staff meeting or professional development day is a good opportunity for you and interested study group members to lead the rest of the staff in small group workshops. Each study group might offer a 30-40-minute session, either to share what you are learning and/or to engage your colleagues in problem-solving or getting feedback on emerging tools or other resources.

May Celebration of Learning: Each year study groups share what they have learned with each other and with the rest of the school and the wider community at a Celebration of Learning.

- As the May Celebration approaches, you will likely use more of your study group time for planning exhibit panels or presentations to share what you have been learning.
- After the celebration, you might want to find out if anyone in your group is interested in making public classroom examples and/or strategies or tools for supporting playful learning, either online, at conferences, or in relevant publications.

8 Supporting yourselves as facilitators

How do you support yourselves in the playful participatory research process? In part, this depends on whether you can make or take the time to meet in monthly or bimonthly facilitator support meetings. If you have the time, use a predictable structure for meeting agendas (See *Ideas for Building a Facilitator Meeting Agenda* on page 54). Decide on a schedule for the year with your colleagues, reserve a room for your meetings, and set up a rotation for snacks and the facilitator/notetaker role. Consider using part of each facilitator meeting to work or get feedback on study group agendas. (These meetings should be considered confidential.) At the last meeting of the schoolyear, reflect on the year and the celebration, and begin to plan for the coming year.

Meeting Ro
PoP STUDY
Group

Resources for teacher research

Being a PoP Teacher-Researcher

Being a Teacher-Researcher

What do PoP teacher-researchers do? We engage in a process of inquiry to explore research questions related to learning through play. This process involves: ① developing a question; ② gathering data by documenting learning through play; ③ interpreting the data together (shared analysis); ④ making connections beyond our own practice; and ⑤ planning for a new cycle of inquiry to continue exploring the research question. At the end of an inquiry process, we also ⑥ share our findings with the ISB community and sometimes with the wider world.
Below, each of these steps is described in more detail.

Developing a Research Question

As PoP teacher-researchers, we investigate what it means to learn through play in our classrooms and throughout our school environment. Working individually, in teams, or as a study group, we develop and explore research questions about playful learning. Research questions have covered a wide variety of interests around learning through play at ISB, such as: How can we use free play to support children's learning of another language? How can P4 children experience maths in the playful way mathematicians do? What happens when we ask children questions during their play with blocks? To learn more, see *Developing a Research Question* on page *18* and *Frequently Asked Questions* on page *80*.

Gathering Documentation (Data Collection)

Teacher-researchers need data to help answer their research questions. We use documentation — video and audio recordings, photographs, samples of children's work, and transcripts of classroom conversations and interactions — as our most important data source. Gathering this type of information is a regular part of what teacher-researchers do while teaching. We define documentation as:

the practice of observing, recording, interpreting, and sharing through different media the processes and products of learning in order to deepen learning.*

Project Zero researchers have been doing research on documentation and group learning as part of the Making Learning Visible project for more than two decades. Their culminating book, "Visible Learners: Promoting Reggio-inspired approaches in all schools" has been a valuable resource for the ISB PoP project. In particular, the following approaches and tools were especially helpful (and are therefore included in this Study Group Guide): *Documentation Planner* on page *19*, *Frequently Asked Questions* on page *80*, *Documentation vs. Display: What is the difference?* on page *21*, *Documentation: When does it make learning visible?* on page *22*, *Quick-Start Guide to Documentation* on page *23*.

* See Chapter 9, "Unpacking the practice of documentation" offers a detailed explanation of the nuances of documentation. In **Krechevsky, M., Mardell, B., Rivard, M., & Wilson, D. G. (2013).** *Visible learners: Promoting Reggio-inspired approaches in all schools.* John Wiley & Sons.

Looking at Documentation Together (Collaborative Data Analysis)

Each study group will decide on protocols for collectively looking at and discussing the documentation and keeping track of the learning about the research questions. When we review documentation and consider how it can inform our questions, we are doing what researchers call "collaborative data analysis." Looking together at a video clip or other artifact of student learning provides a common reference point on which to base our analysis. Taking notes during our conversations about documentation helps us track our thinking about our research questions. We might also use play and playfulness (e.g., pretending, imagining) to bring new perspectives into our analyses.

Making Connections

It's very likely that someone else (at ISB or in the wider world) has also explored research questions similar to ours. During study group sessions, we might engage in playful provocations, such as hands-on activities related to our inquiries, or play with ideas and frameworks generated by other researchers or teachers that could help us think about our questions. We might also draw on the work of our colleagues or read and discuss an article by other educators or researchers, connecting these ideas with our own.

Planning Next Steps

After each cycle of gathering and interpreting documentation, we think about next steps for our teaching or for sharing back with our learners. We create a new plan to document and then gather more data to inform our questions.

Sharing Findings

We continue working with a research question until we feel ready to move on. This might take a month, several months, a year, or longer. Being finished with a question doesn't have to mean that we have answered it completely — in fact, that is rarely the case. But we feel that we have learned something and/or are ready to explore something else.

Depending on the nature of our question, we might share our research findings: through a presentation or workshop, a poster or display, a piece of writing, a tool or resource, a dramatization, or a combination. Sharing might happen with colleagues at a division meeting or staff meeting; with students in our class or at an all-school assembly; with parents in a newsletter, parent-teacher conference, or parent university; or with the wider world — when visitors come to ISB, on the ISB website, or at a professional conference.

When conducted intentionally and in-depth over time, this inquiry process is an important form of education research that is respected in the wider education field. In addition to sharing findings with their communities, teacher-researchers publish research studies in journals, present their work at international conferences, and contribute to knowledge in the field. Conducting teacher-research with colleagues is also a powerful form of professional development – through research, we learn as individuals and as a group, continuously keep our teaching practice interesting, playful, and fresh.

Developing a Research Question

Your research question should be:

- **Of interest** to you/your team and perhaps others
- About **play and learning**
- **Relevant** to your daily practice
- **Open-ended**
- Something to which you **don't already know the answer**

Considerations

- Make it a **manageable size** (e.g. confined to a particular activity, group of participants, time frame, etc.).
- Make sure you could gather documentation for this question in **30 min or less**.
- Try a question starter:
    - *"How do I ..."*
    - *"How can I..."*
    - *"What happens when..."*
    - *"How does X impact/affect/change/influence Y?"*
    - *"What can I learn about..."*
    - *Other open-ended "how" or "what" questions*

Sample Questions

The questions below include examples of past research questions by ISB teacher-researchers. Consider replacing the words in *italics* with your own interests or wonderings relevant to your classroom.

- How does providing more structure or guidance during *music* impact children's playful learning?
- How can I use play to support the reflection process for students who *struggle* in MYP?
- What happens when you use elaborate pretense (pretending) with the *whole P4 class*?
- How can we use observations of children's play to connect what they care and are curious about to the *inquiry projects in Kindergarten*?
- How can the structure of the *Creator Space* be set up in a way to help kids be independent and stay engaged with the activities during ASC?
- How can we help a quiet student (*insert name*) be more playful during math?

Adapted by Pedagogy of Play at Project Zero, Harvard Graduate School of Education, from "Documenting Individual and Group Learning" in **Allen, D., and Blythe, T. (2003).** *The facilitator's book of questions: Tools for looking together at student and teacher work.* New York: Teachers College Press.

Documentation Planner

Team members: _____ Date: _____

What is your question or area of interest?

_____

_____

_____

How is your question relevant to your daily practice?

_____

_____

_____

What/whom will you observe?

_____

_____

_____

Where and when will you observe?

_____

_____

What documentation tools will you use (paper and pencil, camera, audio recorder, etc.)?

_____

_____

When and where will you (and your team) look at the documentation in order to shape it for the next study group?

_____

_____

Adapted by Pedagogy of Play at Project Zero, Harvard Graduate School of Education, from "Beginning to Document by Stepping Back" in **Krechevsky, M., Mardell, B., Rivard, M., & Wilson, D. (2013).** *Visible learners: Promoting Reggio-inspired approaches in all schools.* John Wiley & Sons.

Taking Stock of Your Research

Use this tool midway through your research process.

1. Think and write (on your own)

Write your question below:

Check:

- Is it relevant to your daily practice?
- Is it narrow/specific enough to learn something in the next few months?

What have you tried?

2. Work on hypotheses (with a partner or small group)

What are you learning about your question and how do you know?

3. Consider next steps (with a partner)

What else could you try? Engage in a rapid brainstorm of possibilities (each partner has 2 minutes). Write them here:

Documentation and Display: What's the Difference

It can sometimes be hard to distinguish documentation from display. One thing you can do is to consider the five features of documentation:

- Does the "display/documentation" involve a question about learning?
- Is it shared back with the learners?
- Does it involve more than one medium?
- Does it entail multiple perspectives, and include adult analysis or reflections?
- Does it help inform future learning experiences as well as revisit past learning?

You could also say that most *documentation* shows evidence of the learning process as well as product, and isn't just a record of what happened, but an analysis or interpretation of the learning that took place. The handout *Documentation: When Does It Make Learning Visible?* (page 22) may be helpful as well.

Finally, the following quotes may be informative. They are from a chapter by George Forman and Brenda Fyfe (1998) entitled "Negotiated Learning through Design, Documentation, and Discourse" in the *Hundred Languages of Children: The Reggio Emilia Approach —Advanced Reflections* (pp.245-246).

- "The passage from display to documentation travels the path from informing to educating and thereby changes the teacher's perspective from observing children to studying children..."
- "When applied to negotiated learning, displays should be converted to documentation by adding interpretation and explanation to the graphics. A set of photographs pasted to posterboard showing a trip to the farm is a display. A set of photographs captioned with the children's words would still be a display. The panel needs commentary to qualify as documentation..."
- "Documentation invites inquiry about the children's thinking and invites predictions about effective teaching...Display invites pleasure and satisfaction, but is not deliberately designed to provoke hypotheses. Documentation is a research report used to enhance discourse rather than a record of a past event."
- "Documentation, as we mean it here, is more focused on children than on a child. Even when a child is featured in documentation, the intent is to have the viewer treat this child as a representative child..."
- "Documentation tries to raise questions about children's thinking and teaching strategies rather than to mark the progress of all individual children..."

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Documentation: When Does It Make Learning Visible?

Documentation serves different purposes during different stages of learning. The criteria for what counts as quality documentation depend on the context. What seems to remain constant is that quality documentation focuses on some aspect of learning—not just "what we did"—and it prompts questions and promotes conversations among children and adults that deepen and extend learning.

Here are some questions to ask when creating or examining documentation that tries to make learning visible. These questions may change depending on your purpose or context.

For collecting documentation to aid your own reflection:

- Am I documenting my own words and actions as well as the students'?
- Does the documentation help me re-examine things I did not initially notice or understand?
- Does the documentation help me identify key moments of learning or aspects of the learning context?
- Does the documentation suggest next steps for teaching or learning?
- Does the documentation raise questions I can discuss with my colleagues or students?
- What other documentation might I collect to extend this inquiry? Would my documentation be strengthened by using more than one medium?

For using documentation in the class with your students and colleagues:

- Does the documentation focus on learning, not just something we did?
- Does the documentation promote conversation or deepen understanding about some aspect of learning?
- Does the documentation help me to address a particular question I have about learning?
- When is an appropriate time to share the documentation with my students?

For documentation that is to be shared more widely:

- Does the documentation provide enough context for the viewer to understand the piece?
- Does the documentation focus on learning, not just on what was done?
- Does the documentation focus on the process as well as the product(s) of learning?
- Does the documentation clearly communicate the aspects of learning I consider most important?
- Does the documentation include an interpretation by teachers and/or students?
- Does the documentation include more than one medium?
- Does the documentation have a title?
- Is the documentation presented in a way that draws the viewer in?
- Does the documentation add to our collective body of knowledge and promote conversations about learning?

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Quick Start Guide to Documentation:

Learning to Document, Documenting to Learn

When and what do I document? *

- When I notice students learning through play in a way that surprise, inspires, or excites me
- When my absence from the learning experience will not adversely affect the learning
- When I notice a pattern in behavior, confusion, or ideas that I want others to notice
- When I am, or an individual or group of students is, struggling or has a question and wants to understand someone or something more completely
- When I want to tell or help a child to tell a story of learning
- When an "Aha!" moment seems to be happening for an individual or group
- When we are working on a specific skill, strategy, or routine and need evidence to assess progress
- When I know someone will ask, "What are they learning from doing this?"
- When I anticipate changes in thinking, understanding, or behaving over time
- When I find myself feeling like things are or are not "going well" and I need evidence to support my perception
- When I sense a quality of engagement or disengagement that is striking
- When groups (small or large, successful or unsuccessful) are working together without teacher facilitation
- When I notice purposeful and connected discourse of almost any kind
- When language or memory is a weakness for one or more students
- When I hear voices that are seldom heard or notice struggling students feeling successful
- When I want to make individual thinking visible and accessible to the group — e.g., to share an idea that will move individual or group thinking forward, demonstrate multiple perspectives (or disagreement) about a single topic, or challenge misconceptions

* Adapted from "Amanda Van Vleck's Occasions for Documentation" in **Krechevsky, M., Mardell, B., Rivard, M., & Wilson, D. (2013).** *Visible learners: Promoting Reggio-inspired approaches in all schools.* John Wiley & Sons.

How do I document?

- Keep baskets with "documentation note" papers and pens handy around the classroom (see example). When you see something interesting, jot it down on a note and put it back in the basket. When you have prep time, gather the notes and look through them, to inform future teaching, add to students' portfolios, or share with students, parents, or colleagues.
- Take a photograph and write down what students are saying and/or doing in that moment.
- Invite one or two students to hold a camera or video camera and capture a learning experience.
- Record a conversation. You can use your phone or audio recorder OR write down what students are saying – either on a chart paper so they can see you writing the ideas, in your notebook, or on post-its.
- Take a short video (1-3 minutes) of a moment during a learning experience. OR, set up a video camera on a tripod to record an experience you're especially excited about, and later cut out a short clip of video to share. (If possible, jot down the time(s) you'd like to return to.)
- Exit ticket/tweet: Ask students to jot down one insight and one puzzle (or something they learned from another student) before they leave class.
- When posting student work, add a few sentences about what you learned about your students' learning.
- Use speech bubbles. Copy or laminate speech bubble pages for each of your students with a photograph of the student and an empty bubble. Write interesting or provocative comments into the bubbles and post.
- Sometimes after the experience (notes can be jotted down from memory or photos re-enacted) to travel back in time and facilitate revisiting

What do I do next?

Reflect on your own or with colleagues

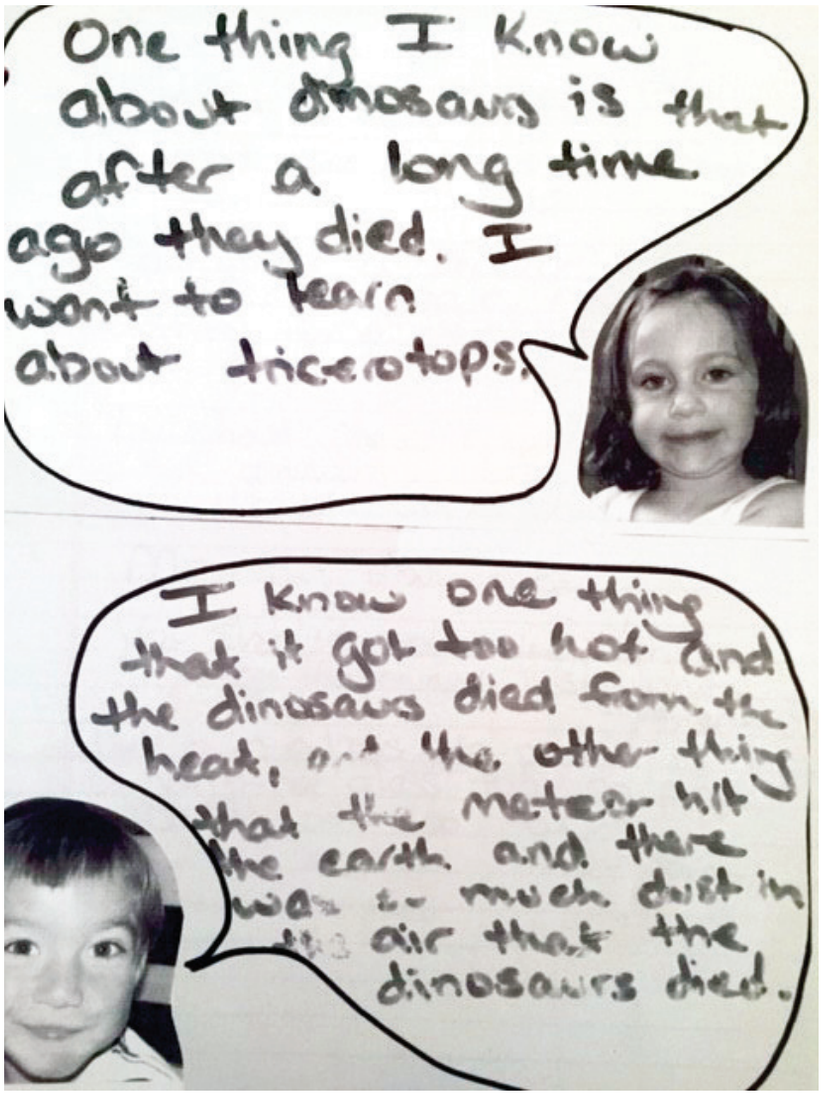
- Look back at the documentation to determine students' interests, strengths, understandings, or misunderstandings in order to inform your next teaching steps
- Post something to your study group's Padlet and ask for *See, Think, Wonder* comments.
- Start a routine of sharing a short video clip or other type of student work with your colleagues at the start of your planning meetings
- Post a piece of documentation with post-its in the staff room with a note asking colleagues to respond to a particular question

Share documentation back with learners

- Share back a provocative or insightful comment, question, or exchange from one or more learners
- Post photographs of learning moments or artifacts on a wall with a caption or question. Revisit with students and write down what they say
- Share a few moments of video, a couple of quotes, or a photo from a previous lesson as a reminder of important learning moments before you begin the current lesson

Share more widely

- Ask your students which part of their learning they most want to share with the school community and in what format
- Make one aspect of the learning process visible when putting on performances, exhibitions and the like
- Post documentation outside of the classroom for the school community to see



Documentation Notes

Children: _____ Documenter: _____

Date / Time: _____ Location / Area: _____

Activity: _____

Notes: _____

_____

_____

_____

WRITING
Post-it Notes,
Rose-Thorn-Seed
DRAWING
Reflection masks
SPEARING
INDIVIDUAL
INTROSPECTIVE
INDIVIDUAL
EXTROSPECTIVE
SOCIAL
DIMENSION
MEDIUM
DURATION
TIMING
BEFORE
AFTER
DURING
EXTENDED
SNAPSHOT
PAIR TOWARDS
INDIVIDUAL
PAIR TOWARDS
COLLECTIVE
SMALL GROUP
TOWARDS COLLECTIVE
SMALL GROUP
TOWARDS INDIVIDUAL
MUSIC
Composing themes
PRESENTING
Gallery Walk
INTERVIEWING
Coach-Client Interviews
Video reflections
ACTING
Role playing, tableaus
CONSOLIDATING
KNOWLEDGE
EXTENDING
KNOWLEDGE
REINFORCING
LEARNING
ASSESSING
LEARNING
PROGRESS
SUCCESS
CRITERIA
ATTITUDE

Resources for Facilitating Adult Study Groups

Discussion Protocols for Being a PoP Teacher-Researcher

Study group members have found it useful to discuss *Being a PoP Teacher-Researcher* (page *16*)at the start of the year to orient themselves to the inquiry process. Here are two possible protocols to structure a discussion about the reading:

Discussion Protocol #1

1. Ask study group members to read *Being a PoP Teacher-Researcher* before your session, or allot reading time during the session itself.
2. Framing: "We want to unpack the role of being a teacher-researcher in greater depth to set us up for our work together this year. Please pair up and read/review one section of the document." (assign the sections in advance)
3. Ask each pair to carry out the steps of a "text rendering" protocol (*www.schoolreforminitiative.org/doc/text_rendering.pdf*), i.e., identify a sentence, phrase, and word in the text that they think are especially significant.
4. Ask each pair to read their sentence, phrase, and word aloud, and for the rationale behind their choices.
5. Invite the group to reflect on what it heard. What is something about being a teacher-researcher that excites them? What is something they want to work on?
6. Debrief the protocol.

Discussion Protocol #2

1. Ask study group members, individually or in pairs, to read a section of *Being a PoP Teacher-Researcher* and underline one sentence that either resonates with or surprises them, or that they have a question about.
2. Ask each person or pair to share what they underlined and why. Discuss.
3. Final thoughts: What are you especially excited about? What do you want to learn more about?

Designing and Facilitating Adult Study Groups

Even if you are committed to creating an adult study group to look at documentation of student learning, it can be hard to know where to start. This tool identifies key features to consider when launching adult study groups. It also includes a sample agenda and discussion protocol for looking at documentation of student learning.

Who This tool is most useful for administrators, professional development providers, or teacher leaders who facilitate adult study groups such as classroom teams, grade-level colleagues, members of an academic department, or colleagues from different schools.

How Consider the following elements when forming adult study groups.

Group Size and Composition - Determine size of the group (ideally four to eight participants) and criteria for group membership depending on your goal (e.g., interest in the topic, similarity or diversity of grade level or subject matter, or variety of perspectives).

Length and Frequency of Meetings - Decide on length and frequency of meetings — ideally at least forty-five to sixty minutes and once or twice a month.

Rotation Schedule - Create a rotation schedule in which one to two individuals or teams share documentation at each meeting.

Documentation Guidelines - Propose guidelines for selecting and sharing documentation:

- Ask participants to identify a focus question about teaching and learning to guide their inquiry (see page 16). Although posing a question about teaching and learning often helps to focus the collection and selection of documentation, sometimes teachers prefer to document in a more open-ended fashion to see what emerges.
- Put your documentation into an easily shareable format such as PowerPoint or video that can be shown on a laptop or projected, or make copies of text and images for the entire group to look at. Video clips should be fewer than five minutes and, ideally, viewed twice. Written documents should be able to be read in three to five minutes.
- Keep context brief (two to three minutes).
- Choose a protocol or thinking routine for discussing the documentation.

Group Norms - With the group, identify group norms such as the following:

- Start and end on time
- Ensure equal participation (occasional go-arounds can be useful here)
- Rotate roles such as note taking, time keeping, facilitating, and monitoring norms

Notes - Think about how to capture what the group is learning for its own use or for sharing with others.

Sample Meeting Agenda (Thirty to Thirty-Five Minutes)

- Review meeting goals, group norms, agenda, and notes or highlights from the last meeting. (two minutes)
- Participants give brief classroom updates since last meeting. (three to five minutes)
- Presenter provides brief context. (three minutes)
- Group asks presenter clarifying questions. (two minutes)
- Group looks at documentation in silence. (three to five minutes)
- Group responds to following questions while presenter is silent. (ten to twelve minutes)
    - What do you see or hear in the documentation? Point to what makes you say that.
    - What questions does the documentation raise? (Presenter does not answer questions.)
    - What are the implications for teaching and learning and next steps for the presenter?
- Presenter shares his or her take-aways. (two minutes)
- Group members jot down at least one idea to use in their own classrooms and share ideas with the group. (four minutes)
- Debrief protocol and thank presenter. (one minute)

Variations and Extensions

- Presenters may prefer to name one or two questions when giving a brief context for more specific group feedback.
- Experiment with different amounts of time for looking at the work and the protocol as a whole. What do you notice when you spend more or less time with the protocol?
- The following is another possible set of discussion questions for when the group responds. Identify two or three focus questions in the following that one or more of the group is most interested in exploring.

What Are Students Learning and Understanding?

- What are the key concepts or skills the students are working on?
- What evidence do you see of student learning?

How Is the Group Learning?

- How do the interactions or conversations among students help them learn or make learning more difficult? (Consider size and composition of the group, the language and strategies used, the roles students take, and what they choose to share with each other.)
- When does one person's thinking seem to affect the thinking of another or the whole group?
- What does the documentation suggest about creating better conditions (physical space, time, materials, nature of the task, etc.) for learning in groups?

From **Krechevsky, M., Mardell, B., Rivard, M., & Wilson, D. (2013).** *Visible learners: Promoting Reggio-inspired approaches in all schools.* John Wiley & Sons.

Where Do You Go Next?

- What might you try next to deepen or extend students' thinking or learning?
- What might be the value of sharing some or all of this documentation and perhaps your own reflections with the students? What might you select and how might you frame it?
- What is still puzzling or interesting to you after viewing the documentation?

Visit *https://pz.harvard.edu/projects/making-learning-visible* or *www.schoolreforminitiative.org* for additional options.

If You Only Have Five Minutes

- Start a routine of sharing a short video clip or other example of student documentation at the beginning of staff meetings.
- Start staff meetings with five minutes in which anyone can ask for help with a dilemma and get quick feedback or brainstorming.
- Invite a colleague into your classroom when something unusual is going on.
- Display documentation in the teachers' room over the course of a week with a note asking colleagues to share what they see, think, or wonder on sticky notes.

Building a Study Group Agenda

Date: _____ Time: _____

Location: _____ Materials: _____

Step 1: Identify 1-3 learning goals for the session

Goal 1: _____

Goal 2: _____

Goal 3: _____

Step 2: Choose your own adventure from these typical study group components (or invent a new one!)

Much like classrooms, study groups often address two-three different agenda items and ways of working across a 90- to 120- minute session. Agenda items might include:

- Playful provocations
  - see *Ideas for Playful Provocation* on page *44*
- Outside resources
  - Discuss a relevant reading, video, or other outside resource (e.g., an article, book chapter, or Ted Talk)
  - Invite an ISB colleague with related experience or expertise, a Project Zero researcher, or an expert from the LEGO Group to join your meeting either in person or via Skype
  - Give the group some quiet time to think about their questions and jot down what kinds of thing they would want to read or do in order to learn more about their topics. Write the ideas on the board and take a photo so they can be revisited later on.
- Teacher-researcher speed-dating (requires that everyone has viewed everyone else's documentation prior to the meeting; see *Approaches to Discussing Documentation* on page *41*)
  - Quick rounds of sharing question, documentation, emerging hypotheses
  - Use a bubble catcher to track ideas. See *Bubble Catcher* on page *42*
- Look closely at documentation with a protocol
  - see *Approaches to Discussing Documentation* on page *41* for options

- Facilitate an open-ended conversation about a topic of shared interest related to learning through play. Grounding the conversation in a concrete artifact like a reading or piece of documentation often deepens the conversation.
- Plan for the next round of documentation
- Create or use PoP tools
- Other

Consider asking the group to:

- Work in small groups or teaching teams
- Work with people they have not worked with before

Step 3: Choose a reflection to wrap up the meeting

- See *Final Reflection Prompts* on page *67*
- Consider leaving time for those who want to share out their reflections.

Sample Study Group Agendas

The following sample agendas were used in three different study groups at ISB from 2017-2019. The first agenda comes from a kindergarten study group in November; the second from a P4/P5 study group in January; and the third from the Afterschool Club study group in February. Each agenda was shaped to meet the goals and needs of the group at different points in the inquiry cycle. Please feel free to adapt some or all of each agenda for your own purposes.

Sample Study Group Agenda #1

Kindergarten Study Group Agenda
November 2017, 11:30-13:30 in Kindergarten Creator Space

Materials

- Post-its and pens
- Bubble Catcher copies
- *Being a PoP Teacher-Researcher* copies
- Cable to hard-wire internet

Welcome and Replay (10 min)

Replay: share a moment of playful learning that happened today or yesterday at home or at school

Documentation Speed Dating (60 min)

- Documentation will be on Padlet
- Give everyone a "bubble catcher" sheet – explain that after each round we will have 1 min to write down an idea we don't want to lose. It could be a See, Think, Wonder comment, but doesn't have to be.
- 7 min documentation rounds. Each team gets 7 min to:
    - Share their question
    - Remind us of the documentation
    - Share something they learned about the question or a new puzzle, with a couple of minutes for others to respond
- After each round, 1 min silent writing time to jot down ideas in bubble catcher
- At the end, people choose a favorite bubble-catcher comment to share in a round.

Today's Provocation: *Being a PoP Teacher-Researcher* (30 min)

- Framing: We want to unpack the role of being a teacher-research in more depth, to set us up for our work together this year
- Read over the document *Being a PoP Teacher-Researcher*
- Jigsaw – pair up, each pair is responsible for one section of the document
- Text rendering – each pair pulls out a sentence, phrase, and word to represent that section. Read these aloud.
- Reflections – What's something about being a teacher-researcher that excites you? What's something you want to work on?

Brainstorming topics for readings/playful provocations (10 min)

As we saw in Being a PoP Teacher-Researcher, one way to investigate our research questions is through playing with ideas that other people have generated related to our questions. Think about your question – what kinds of things would you want to read/do/try to learn more about your topic?

- Give quiet thinking and writing time for people to sit with their question and consider what would be useful
- Facilitator models with an example
- Write ideas on the board – take a photo at the end to remember the ideas

Reflection (10 min)

On a post-it, write down:

- A Star – something that you learned or were inspired by in this study group meeting
- A Wish – something you hope we will do next time or in the future
- Give those who want to a chance to share out before we go

Reminder

Next PoP In (tomorrow) will be time to plan for your next round of documentation and post it to Padlet

Sample Study Group Agenda #2

P4/5 Study Group Agenda | January 2019, 16:00-18:00 in P4B

Materials/Preparation

- Put comfy chairs in a circle in P4B
- Post its, pens, and markers for chart paper
- Flip chart paper (one for each documentation question, plus some blank paper)
- Remind members to bring an electronic device for accessing documentation (e.g., Padlet, Google, Seesaw) during the meeting

Goals

- Deepen learning through looking closely at documentation
- Begin to develop (and track) hypotheses around research questions
- Feel comfortable with the trajectory of the year

Welcome (10 min)

- Snacks provided by _____ (bring your own coffee or tea)
- Post chart paper with people's questions for reference. Informally ask people where they are: update on research question and documentation, what's working well, challenges, what supports are needed.
- Review agenda for the session

Looking at Documentation, Part I (45 minutes)

Look at one person's documentation and question

- Documenter shares research question, perhaps naming a focus (puzzles or ideas) for the discussion
- Look at documentation (audio clip on Padlet, and copies of 2 pieces of student work)
- Clarifying questions
- Look at documentation a second time (optional)
- See, Think, Wonder (S-T-W)
    - Use S-T-W thinking routine. What do you see or notice? What does that make you think or wonder? (Couple the S-T-Ws in conversation as seems useful)
    - Documenter(s) is silent during the discussion, takes notes using prompts on personal Padlet page
    - Facilitator reminds group members to ground their thinking and wondering in the documentation, as needed

- Hypotheses—Share quote by Steve Seidel (PZ researcher): "Once you have developed a question, you are half way to the answer." Today we are going to spend time working on what "answers" or hypotheses we have so far about our questions.
    - If you had to answer the documenter(s)' research question today, what would you say?
    - Start with a few quiet minutes to think. Might jot ideas down. Share ideas popcorn style. Facilitator writes ideas on chart paper with research question at the top (this will be saved and revisited at future meetings; documenter takes notes.)
- (If time) What might next steps be for the documenter?

Break (5 min)

Looking at Documentation, Part II (45 minutes)

same as Part I, with different documentation

Looking to the Future (10 min)

Continue to work on hypotheses. Put up chart paper for each research question. People walk around with a marker and add emerging hypotheses.

Closing (5 min)

- 2 stars and 1 wish (on post its)
- Clean up

Sample Study Group Agenda #3

ASC Study Group Agenda | February 2019, 10:00-12:00

When	What	Materials
10:00	**Welcome & Update from Feb Staff Meeting Workshop** • What did we do/share? • What did we hear? • What did we learn?	• Coffee, tea, snacks • Slide of inquiry overview

10:10	**Looking at Documentation**
	• Use Edward DeBono's "Thinking Hats" to consider questions/documentation
	• Everyone reads over the descriptions
	• Choose 1 hat you want others to use as a lens for talking about your documentation
	• Documentation Rounds (15 min each)
	  o 5 minutes to present
	  o 5 minutes for people to write down their thoughts
	  o 5 minutes to discuss
	• *Use Friday PoP In time to plan for next round of documentation*
		• DeBono's Thinking Hat handouts
		• (Padlet)

11:20	**Provocation** Activity for the group — Create a template for visuals in the Creator Space	• examples of signs • materials for making sign
11:40	**May Celebration Brainstorm**	
11:55	**Reflections** + What went well? ▲ What would you like to change?	

Forming Ground Rules

A resource developed with the School Reform Initiative by Marylyn Wentworth

Gaining agreement around Ground Rules or Norms is important for a group that intends to work together on difficult issues, or who will be working together over time. They may be added to, or condensed, as the group progresses. Starting with basic Ground Rules builds trust, clarifies group expectations of one another, and establishes points of "reflection" to see how the group is doing regarding process.

Time

Approximately 30 minutes

Process

1. **Ask everyone to write down what each person needs in order to work productively in a group**, giving an example of one thing the facilitator needs, i.e. "to have all voices heard," or "to start and end our meetings when we say we will." (This is to help people focus on process rather than product.)
2. **Each participant names one thing from her/his written list**, going around in a circle, with no repeats, and as many circuits as necessary to have all the ground rules listed.
3. **Ask for any clarifications** needed. One person may not understand what another person has listed, or may interpret the language differently.
4. **If the list is VERY long — more than 10 Ground Rules — ask the group if some of them can be combined to make the list more manageable.** Sometimes the subtle differences are important to people, so it is more important that everyone feel their needs have been honored than it is to have a short list.
5. **Ask if everyone can abide by the listed Ground Rules.** If anyone dislikes or doesn't want to comply with one of them, that Ground Rule should be discussed and a decision should be made to keep it on the list with a notation of objection, to remove it, or to try it for a specified amount of time and check it again.
6. **Ask if any one of the Ground Rules might be hard for the group to follow.** If there is one or more, those Ground Rules should be highlighted and given attention. With time it will become clear if it should be dropped, or needs significant work. Sometimes what might appear to be a difficult rule turns out not to be hard at all. "Everyone has a turn to speak," is sometimes debated, for example, with the argument that not everyone likes to talk every time an issue is raised, and others think aloud and only process well if they have the space to do that. Frequently, a system of checking in with everyone, without requiring everyone to speak, becomes a more effective Ground Rule.
7. **While work is in progress, refer to the Ground Rules whenever they would help group process.** If one person is dominating, for example, it is easier to refer to a Ground Rule that says, "take care with how often and how long you speak," than to ask someone directly to stop dominating the group.
8. **Check in on the Ground Rules when reflection is done on the group work.** Note any that were not followed particularly well for attention in the next work session. Being sure they are followed, refining them, and adding or subtracting Ground Rules is important, as it makes for smoother work and more trust within the group.

Sample Study Group Norms

In the first study group meeting of the year, the group should collectively come up with study group norms or "essential agreements." These norms help establish a way of working together and can be revisited throughout the year. Groups often have roughly 6-8 norms. Below are examples of study group norms from past study groups at ISB:

1. This is a place to take risks and be playful
2. We are all responsible for each other's learning
3. Bring a playful mindset
4. Be positive
5. Monitor your airtime
6. Ask questions when you have them
7. Come prepared
8. Share work in advance
9. It is okay to respectfully disagree
10. Start on time, end on time
11. Don't talk over each other
12. Stay present (only on phone/computer when needed)
13. It's okay to say pass
14. We actively participate
15. We are quiet during reading time
16. Acknowledge that what is playful to one is not necessarily playful to another
17. Everyone takes care of their own needs
18. Everyone takes turns to BRING IN THE HYGGE (cake) to the meeting.
19. We clean up together
20. What happens in PoP meetings stays in PoP meetings

Approaches to Discussing Documentation

- **See, Think, Wonder:** A Project Zero thinking routine that asks three questions: What do you see? What does it make you think? What does it make you wonder?

- **Speed-dating:** A quick way to look at multiple pieces of documentation with minimal discussion. Each documenter or documentation team has up to 5 minutes to share their question and context, remind the group of their documentation, and share something they learned about their question or a new puzzle. The group has 2 minutes to respond. After each 7-minute round, give the group one minute to silently write one or two ideas they want to remember in the "bubble catcher" (a format for capturing ideas you don't want to lose).

- **See "Sample Meeting Agenda" and "Variations and Extensions"** in *Designing and Facilitating Adult Study Groups* on page *29*.

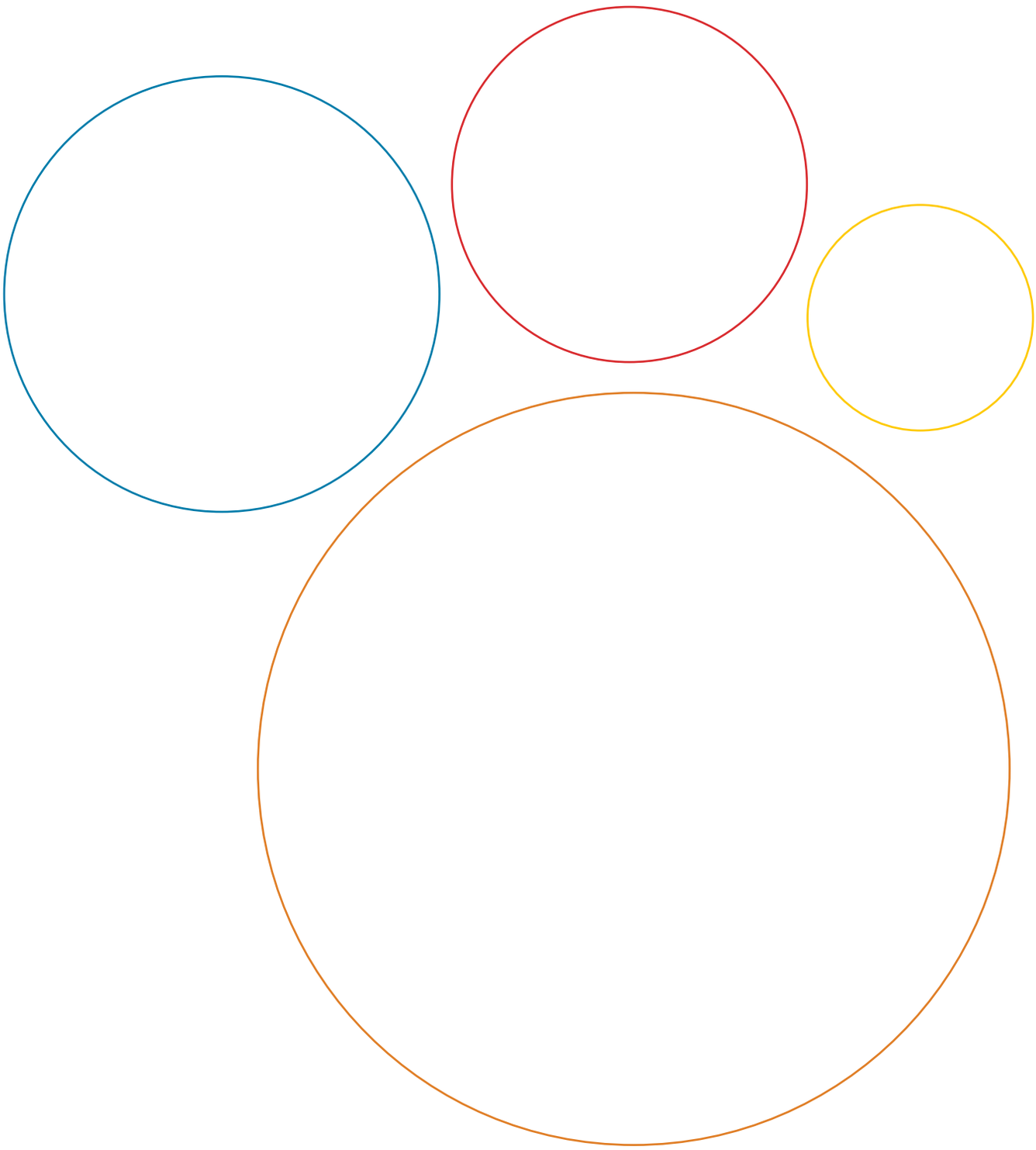
- **Reenactment:** Ask participants to take on roles of individuals in the documentation and re-enact it before discussing it.

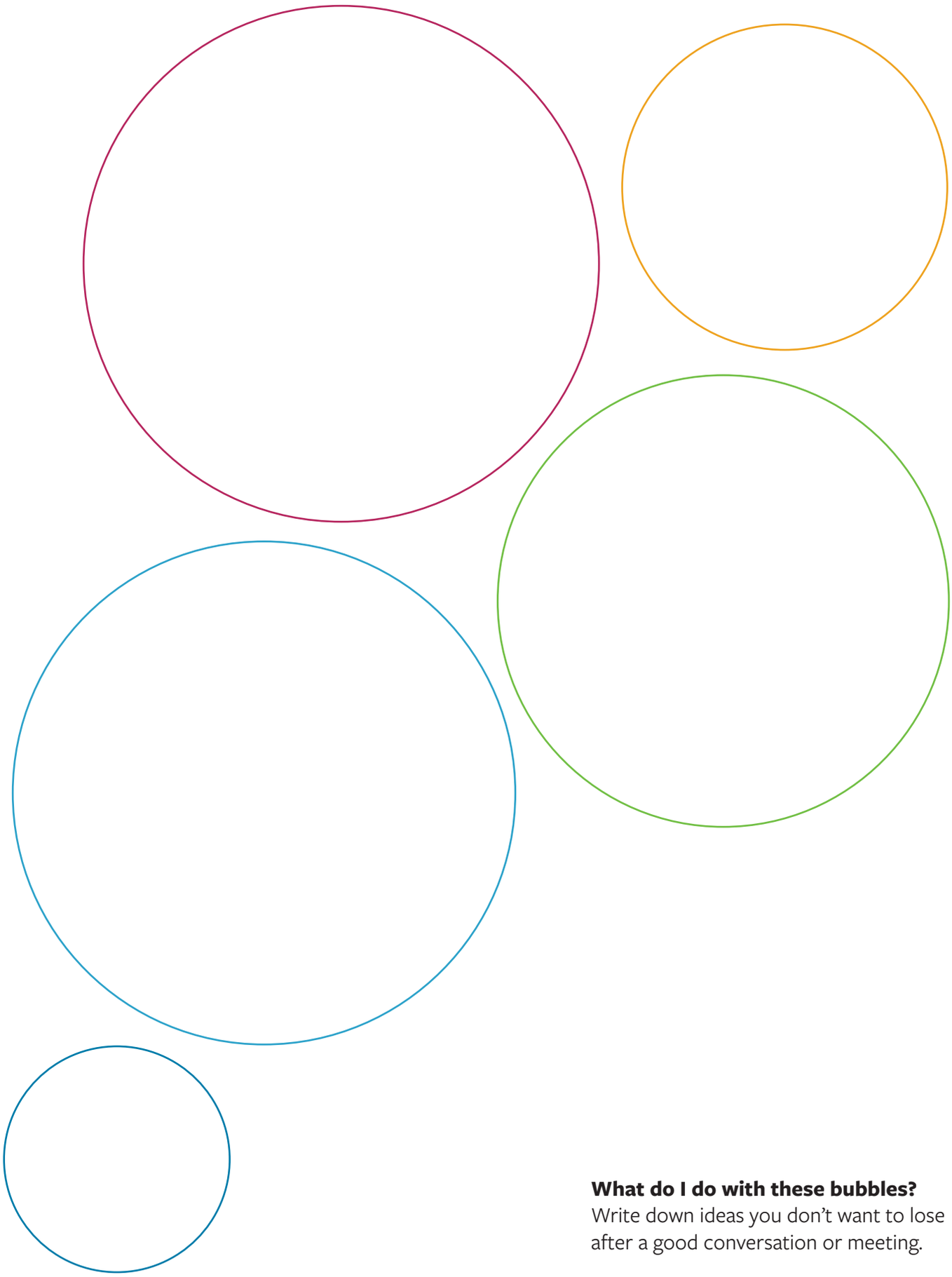
- **Role-play** different viewpoints on the documentation (e.g., role-play a student, teacher, parent, inanimate object in the room, etc., commenting on the documentation).

- **Thinking Hats:** Ask each participant to choose one of Edward DeBono's *Thinking Hats* and share thoughts on the documentation from that perspective (e.g., facts and information, feelings and emotions, creative, cautious, etc.). Alternatively, the documenter might ask the group to comment on the documentation using the one or two hats (lenses) she would find most helpful in light of her question. For more information, see *www.debonogroup.com/six_thinking_hats.php*

Bubble Catcher

The Bubble Catcher is designed for teachers to record ideas that come up during documentation discussions.





What do I do with these bubbles?
Write down ideas you don't want to lose after a good conversation or meeting.

Adapted by Pedagogy of Play at Project Zero, Harvard Graduate School of Education,
from **Sam Sherratt**: *www.youtube.com/watch?v=atqaEROMkZs.*
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Ideas for Playful Provocations

Playful provocations can serve several goals. Sometimes they ease the transition from a full and perhaps stressful day to a more playful mindset; sometimes they support looking at documentation or exploring a research question in a playful way; and sometimes they are designed to re-energize a meeting mid-way through.

Transitioning from a busy day to reflective conversations

- Replay: This ritual takes place in a round. Ask each study group member to recall a moment of play from home or from school. Each person has a minute to talk (use a timer); one can also pass. Members can use images or a short video clip as part of their replay.
- Consider the physical environment:
    - Be creative about the physical surroundings of your meetings. Venture into a part of the school you are not usually in, such as the Gym, the Library, or the Food Lab. Or you might invite MYP teachers to meet in Kindergarten spaces, and vice versa.
    - Consider transforming your meeting space to feel like another setting. For example, arrange chairs and tables to mimic the feel of a café. Add other elements such as flameless candles, table clothes (fabric from the Creator Space), agendas for the meeting in the format of a menu, and/or music to change the mood.
- Consider being playful with snacks (e.g., bring a blender to make your own drinks, bake cookies in the Food Lab, etc.).
- Blow your troubles away: This is an idea that originated in a kindergarten study group. Go outside. Give each person soap bubbles and a wand. Ask them to imagine the stresses of the day floating away with the bubbles they blow.
- Create a design challenge: Think about some creative ways to engage the group in a short, hands-on making or design challenge. These challenges typically feature different materials (e.g. cardboard, wood, yarn, etc.) and often provide opportunities for the group to work collaboratively, brainstorming and solving a problem. Challenges might align with one or more big ideas your study group is exploring, or they might simply entail creative process and play. Examples of design challenges include the marshmallow challenge (see which group can build the tallest tower using a set number of marshmallows and spaghetti strands, tape, and string), or feel free to riff off these:
    - Build a bridge that spans a foot and can hold up your cell phone (decide in advance on the materials available).
    - Design a simple machine that can launch a water bottle from one side of the room to the other.
- Story telling/story acting (tied to a research question): This suggestion is based on the storytelling/story acting technique of Vivian Paley (see *www.bpsearlylearning.org/storytelling-and-story-acting* for more information). Each member writes an "up-to-one"-page story related to the study group (e.g., members of the Language Learning Study Group wrote stories about an important way they learned a second language as a child). Study group members then sit in a circle. The facilitator identifies the different characters in the story (including inanimate objects), and reads the story, asking each member in turn to go into the middle of the circle and act out their part in the story.

- Visit one person's classroom and use the "See, Think, Wonder" thinking routine.
- Perform a skit: A skit can be used as a transition or as a way to explore a research question in a playful way.
- Informally check in with people at the start of the study group as they get snacks. Ask about their research question and documentation — what's working well, what are some challenges, what kind of support would be helpful? You might go around in a circle taking turns, or have smaller group conversations. Timing each response (e.g. up to 1 or 2 minutes) can ensure that the check in does not exclude other agenda items.

Looking at documentation or exploring a research question in a playful way

- Ask adults to do what you will be trying with children (e.g., if you want children to create pretend houses in the woods, ask adults to make a house; if you are exploring using play to support learning in math or a new language, ask adults to playfully engage in a math problem or a language game; etc.).
- Design a school or classroom hunt based on a research question (e.g., when researching playful environments, ask adults to find spaces that encourage playful learning, or look for opportunities for children to take more responsibility for their own learning, etc.).
- Act out the documentation you are discussing (see *Approaches to Discussing Documentation*, page *41*).

Re-energizing a meeting at the mid-way point

- Take a yoga break.
- Make a tent using chairs or a table for a small group discussion.
- Do a walk-and-talk: Movement and/or being outside can be conducive to good thinking. Take your study group conversation outside to provide new energy and a fresh perspective.

Questions for Study Group Member Check-ins

Study group check-ins are 30-minute one-on-one conversations that happen twice a year between the facilitator and each member of the group. Each conversation has a different set of goals. Below are questions to choose from at each check-in. In general, ask 4-6 questions per conversation; the quality of the conversation is more important than the number of questions asked.

1. Conversation #1 (before study groups begin, often in August)

At the start of the conversation, share the goals for the conversation, how long it will take, and a bit about yourself if you don't already know each other.

Goals

- Build relationships
- Understand where people are coming from and why they joined the study group

Possible Questions (select a few based on your goals for the conversation)

Background

- What brought you to ISB?
- Briefly describe your teaching experience (training, time in the classroom) before you came to ISB. (You could also share your own background.)
- Can you describe a moment of playful learning from your childhood? (Share a moment from your own childhood.)
- (At the end of the conversation) Is there anything else you would like me to know? Do you have any questions for me?

Study Groups

- As you think about the coming year and the experiences of your learners, what questions or topics related to learning through play are most on your mind?
- What activities would you like to see the study group engage in this year?
- [If you have been in a study group before:
    - Do you think PoP has changed how you teach, plan, or assess? Has it changed how you think about play or playful learning? If so, how?
    - What has worked well for you in study groups in the past that you would like to see continue and what could be changed?

Playful Learning

- How do/would you like to support learning through play in your work as an educator?
- If you were to finish this sentence, what would you say? "Playful teaching/learning involves _____." Can you give some examples of what that might look like in your work?
- What does play mean to you?
- What aspects of learning through play do you feel you're really good at, and what aspects do you have questions about?

2. Conversation #2 (midway through the year, often replaces December study group)

Goals

- Revisit research question and consider modifications
- One-on-one coaching around documentation and playful learning
- Feedback on the study group in general
- Relationship-building

Possible Questions

Feedback about the study group

- As you may know, one of our goals is to create a playful learning environment for adults, where you get to explore, experiment, and experience delight. We are curious about what your experience has been so far. What about being a PoP teacher-researcher do you find playful? What hasn't felt playful?
- What suggestions do you have for things we might add to, remove, or change in the study group as we move forward?

Support for research questions and related documentation

- Are there any insights you have gained so far about your research question?
- Look at a small piece of documentation together. Use the See, Think, Wonder thinking routine or a modification, e.g., say what you notice, then name potential next steps (in relation to your research question and/or next steps in documenting).

Other

- Is there anything else you would like me to know? Do you have any questions for me?

Considerations for Responsive Facilitation

A resource developed with the School Reform Initiative by Marylyn Wentworth

Facilitation is a crucial part of any kind of collaborative work. A responsive facilitator has to keep many things in mind as she/he supports the work of a collaborative group. The following list is intended as both a general reminder of important skills, and a checklist of areas one might want to focus on for personal growth.

A responsive facilitator has to:

1. Pay attention to group dynamics all the time — body language, who's speaking and who's not, voice tone, reactions between group members, secondary agendas, and judgmental comments;
2. Pay attention to inclusion of all members;
3. Attend to agreed-upon group norms, adding new norms as needed for productive group work;
4. Be able to help a group figure out what it needs, or
5. Figure out what a group needs if it can't — give guidance, and then...
6. Be able to change the agenda to meet the group needs, without losing sight of the purpose/goals of the activity, workshop, or work session;
7. Be able to distinguish between one's own agenda and the agenda of the group;
8. Have a way to identify oneself in the role of facilitator, teacher, and person, when the roles change, and let the group you are facilitating know (One facilitator friend actually has 3 hats and puts them on when his role changes);
9. Know when you are stumped and get help from a colleague or ask the group where to go now —transparent facilitation often works well. It is important not to appear to be an expert when stuck;
10. Recognize when the whole group, sometimes the facilitator too, is "stuck" and put the issue/dilemma, in the "parking lot" for later when there's been time for reflection and distance, and move on;
11. Be able to step back — get some distance — when you feel yourself being emotionally drawn into difficult group dynamics;
12. Own up to goofs and misperceptions — they are usually great opportunities for learning, and you provide modeling;
13. Resist taking things personally. Groups or individuals sometimes vent their frustration, anger, fears, on the facilitators. That can actually be a sign of dissonance and means progress and change — usually. Take several deep breaths;
14. Work for balance between process and content, but give precedence to process over content when you have to choose. Safe, bonded communities of learners have a higher learning curve;

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www.schoolreforminitiative.org/download/considerations-for-responsive-facilitation/

15. Celebrate when groups move from pseudo-community to the beginnings of real community in a longer workshop. Little of substance can happen in pseudo-community when everyone is being "nice." This change often occurs on the third day people are together for some reason. The passage is often stormy, comes at unexpected moments over surprising issues, and sometimes involves tears, anger, fear, guilt, and any other emotion. Facilitating a group through this passage can be tricky work. It is here that a facilitator has to distinguish between the growth of a community through the intended goals and purpose — and therapy. Facilitators are not therapists and it is vital not to cross that line, however fuzzy it seems at times;
16. Keep a sense of humor!!! Everyone is human and can make any number of amazing mistakes as well as bring memorable insight and wisdom. Laughing together is a gift and helps keep perspective.

Providing Feedback during Protocols

Developed by the School Reform Initiative with educators in the field

Warm	Cool	Hard
Recognizing Highlighting Specific	Analyzing Discerning Probing	Challenging Extending So What?
Example: " I see excellent use of ..." "On page 2, I see a good example of..." "Attention to detail is evident in the following areas..." "I like the way you..."	**Example:** "I wonder if this fits that." "It looks like you wanted this to do that, but I'm not sure it does." "I can't tell if the student is to do this or that." "It is hard to tell what the goal was, and what the thinking skills were."	**Example:** "Does this do what we value?" "Does the activity meet the stated goal?" "Will it consistently provide similar results?" "Who is favored by this and who is penalized?"
This type of feedback highlights the specific areas in which the work is strong.	This type of feedback uses critical distance, which means taking a closer look to analyze, probe and discern.	This type of feedback challenges and extends what is presented. It will test the meaning of the work and provide direction for development.
This level of feedback requires the least amount of trust, and should always be present.	Trust must be present in the group to give cool feedback.	The group needs to have a higher level of trust and presenter should ask for this type of feedback.

The facilitator's responsibility is to check with the presenter as to their comfort in the level of feedback. Make sure that the presenter is ready and wants hard feedback before utilizing that level.

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www.schoolreforminitiative.org/download/feedback-provided-during-protocols/

Probing Questions to help the presenter think more deeply about the issue at hand

What would have to change in order for...?

What criteria did you use to...?

What's another way you might...?

Why is this such a dilemma for you?

What if the opposite were true? Then what?

What do you feel is right in your heart?

How was...different from...?

What might you see happening in your classroom if...?

What would it look like if...?

What sort of an impact do you think...?

What do you think would happen if...?

How did you decide/determine/conclude...?

When have you done/experienced something like this before?

What is the connection between...and...?

How might your assumptions about...have influenced how you are thinking about...?

What was your intention when ....?

Why do you think this is the case?

What do you wish...?

What do you assume to be true about ....?

Resources for Supporting Study Group Facilitators

Ideas for Building a Facilitator Meeting Agenda

When: 60-90 minutes every month, if possible

Where: _____

Who: 1-2 facilitators take responsibility for the agenda on a rotating basis

Goals

- To support facilitators in their work by offering a space for reflection, dialogue, planning, and community-building
- To share ideas across study groups

Participant Preparation (before the meeting)

- Choose a moment of playful learning from your most recent study group to share
- Identify a question about how your last session went or something you want to figure out for your upcoming session
- Tips or things that went well that you want to share with the group
    - Decide roles before the meeting (consider creating a schedule at the beginning of the year)
        - Meeting facilitator
        - Who (if anyone) would like to bring a dilemma and/or documentation
        - Note-taker
        - Snack provider
        - Meeting preparation (e.g., reserve the room, copy handouts (e.g., bubble catchers), bring materials, etc.)

Welcome (5 min)

- Replay
- Check in about any burning questions/topics

Part 1: Choose from one of the following options (30 min)

1. Study group rounds

- Each study group facilitator shares what your group is working on. What are your research questions at the moment? What is one highlight, tip, or puzzle you want to share? This is a chance to cross-pollinate and get some quick feedback from the whole group.

- Share in a round, 3-4 min for each facilitator (see "preparation" section above) with time for a couple of comments/connections from others.
- Provide a bubble catcher for each person to track 2-3 ideas from other groups you might share with your study group at the next PoP In.
- Raise puzzles or ideas you would like to discuss in future meetings.
- At the end of the rounds, pick the puzzles you consider action items, and make an action plan for moving forward (this could mean revisiting them at the next meeting as a dilemma).

2. Explore a facilitation dilemma

Use the *Consultancy or Modified Consultancy Protocol* on the next pages to explore a dilemma a facilitator would like to discuss.

3. Look at facilitator documentation

Facilitator brings one or two pieces of documentation to explore a question about adult learning (this is similar to #2 above, without the protocol).

Part 2: Planning for upcoming study group meetings (30-45 min)

- Get a drink and snack and sketch out a plan for your upcoming study group meeting. Consider any new ideas from the earlier discussions that you might integrate into your agenda. (15-20 min)
- Share your emerging plan and get feedback from the group (e.g., plus/delta — 1 thing to keep and 1 thing to change) (10-15 min)

Wrap up (5-10 min)

- Fill out star and wish reflections (see *Final Reflection Prompts* on page 67) on Post-it notes. Stick to the door as you leave, or share out as time allows.

Consultancy Protocol

Adapted from the School Reform Initiative's "Consultancy Protocol." Developed by Faith Dunne, Paula Evans, and Gene Thompson-Grove as part of their work at the Coalition of Essential Schools and the Annenberg Institute for School Reform.

Purpose

The structure of the Consultancy helps presenters think more expansively about a particular, concrete dilemma. The Consultancy protocol has 2 main purposes – to develop participants' capacity to see and describe the dilemmas that are the essential material of their work, and to help each other understand and deal with them.

Time

Approximately 50 minutes

Roles

- Presenter (whose work is being discussed by the group)
- Facilitator (who sometimes participates, depending on the size of the group)
- Consultants

Outside perspective is critical to the effectiveness of this protocol; therefore, some of the participants in the group should be people who do not share the presenter's specific dilemma at that time. The Consultancy group is typically a small and intimate one – from 4-7 people. Larger groups can easily subdivide into consultancy groups.

Process

1. The presenter gives an overview of the dilemma with which she/he is struggling, and frames a question for the consultancy group to consider. The framing of this question, as well as the quality of the presenter's reflection on the dilemma being discussed, are key features of this protocol. If the presenter has brought student work, educator work, or other "artifacts," there is a pause here to silently examine the work/documents. The focus of the group's conversation is on the dilemma.
   (10-15 minutes if there are artifacts to examine)

2. The consultancy group asks clarifying questions of the presenter — that is, questions that have brief, factual answers. (5 minutes)

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www.schoolreforminitiative.org/download/consultancy/

3. The group asks probing questions of the presenter (See *Probing Questions* on Page *51*). These questions should be worded so that they help the presenter clarify and expand her/his thinking about the dilemma presented to the consultancy group. The goal here is for the presenter to learn more about the question she/he framed and to do some analysis of the dilemma presented. The presenter responds to the group's questions, although sometimes a probing question might ask the presenter to see the dilemma in such a novel way that the response is simply, "I never thought about it that way." There is no discussion by the consultancy group of the presenter's responses. At the end of the 10 minutes, the facilitator asks the presenter to re-state her/his question for the group. (10 minutes)

4. The group talks with each other about the dilemma presented. In this step, the group works to define the issues more thoroughly and objectively. Sometimes members of the group suggest actions the presenter might consider taking; if they do, these should be framed as "open suggestions," and should be made only after the group has thoroughly analyzed the dilemma. The presenter doesn't speak during this discussion, but listens in and takes notes. The group talks about the presenter in the third person. (15 minutes)

   Possible questions to frame the discussion:

   - What did we hear?
   - What didn't we hear that might be relevant?
   - What assumptions seem to be operating?
   - What questions does the dilemma raise for us?
   - What do we think about the dilemma?
   - What might we do or try if faced with a similar dilemma? What have we done in similar situations?

5. The presenter reflects on what she/he heard and on what she/he is now thinking, sharing with the group anything that particularly resonated for him or her during any part of the Consultancy. (5 minutes)

6. The facilitator leads a brief conversation about the group's observation of the Consultancy process. (5 minutes)

Modified Consultancy Protocol

(30 minutes)

Process

1. Overview (3-5 minutes)

The presenter gives an overview of the dilemma with which she/he is struggling, and frames a question for the consultancy group to consider. The framing of this question, as well as the quality of the presenter's reflection on the dilemma being discussed, are key features of this protocol. If the presenter has brought student work, educator work, or other "artifacts," there is a pause here to silently examine the work/documents. The focus of the group's conversation is on the dilemma.

2. Clarifying Questions (3 minutes)

The consultancy group asks clarifying questions of the presenter — that is, questions that have brief, factual answers.

3. Probing Questions (5 minutes)

The group asks probing questions of the presenter (See *Probing Questions* on Page 51). These questions should be worded so that they help the presenter clarify and expand her/his thinking about the dilemma presented to the consultancy group. The goal here is for the presenter to learn more about the question she/he framed and to do some analysis of the dilemma presented. The presenter responds to the group's questions, although sometimes a probing question might ask the presenter to see the dilemma in such a novel way that the response is simply, "I never thought about it that way." There is no discussion by the consultancy group of the presenter's responses. At the end of the 10 minutes, the facilitator asks the presenter to re-state her/his question for the group.

4. Discussion (10 minutes)

The group talks with each other about the dilemma presented. In this step, the group works to define the issues more thoroughly and objectively. Sometimes members of the group suggest actions the presenter might consider taking; if they do, these should be framed as "open suggestions," and should be made only after the group has thoroughly analyzed the dilemma. The presenter doesn't speak during this discussion, but listens in and takes notes. The group talks about the presenter in the third person.

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Possible questions to frame the discussion:

- What did we hear?
- What didn't we hear that might be relevant?
- What assumptions seem to be operating?
- What questions does the dilemma raise for us?
- What do we think about the dilemma?
- What might we do or try if faced with a similar dilemma? What have we done in similar situations?

5. Reflection (3 minutes)

The presenter reflects on what she/he heard and on what she/he is now thinking, sharing with the group anything that particularly resonated for him or her during any part of the Consultancy.

6. Debrief (3 minutes)

The facilitator leads a brief conversation about the group's observation of the Consultancy process.

Has anything changed as a result of participating in PPR?

“Yeah, it has. Like we talked about, for me having a focus on different students than I maybe normally would have. I have a different relationship with those students. I’ve become more aware of different learning styles amongst my students. So now we have a common understanding of what we’re talking about, and how I can support them the best possible way.”

Merete

Selected Thinking Routines, Protocols, and Reflection Prompts

This section includes selected thinking routines and protocols designed by researchers at Project Zero for introducing, deepening, or synthesizing ideas. While these resources were developed to support student learning and thinking, they are useful in supporting adult learning as well. We encourage you to use these routines and protocols as you plan and facilitate study group meetings, investigate your research question, or try things out with learners in your classroom. We also include three options for commonly used final reflection prompts for use at the end of meetings.

See, Think, Wonder

A routine for exploring works of art and other interesting things

What do you see?

What do you think about that?

What does it make you wonder?

Purpose: What kind of thinking does this routine encourage?

This routine encourages students to make careful observations and thoughtful interpretations. It helps stimulate curiosity and sets the stage for inquiry.

Application: When and where can it be used?

Use this routine when you want students to think carefully about why something looks the way it does or is the way it is. Use the routine at the beginning of a new unit to motivate student interest or try it with an object that connects to a topic during the unit of study. Consider using the routine with an interesting object near the end of a unit to encourage students to further apply their new knowledge and ideas.

Launch: What are some tips for starting and using this routine?

Ask students to make an observation about an object – it could be an artwork, image, artifact or topic – and follow up with what they think might be going on or what they think this observation might be. Encourage students to back up their interpretation with reasons. Ask students to think about what this makes them wonder about the object or topic.

The routine works best when a student responds by using the three stems together at the same time, i.e., "I see..., I think..., I wonder .... " However, you may find that students begin by using one stem at a time, and that you need to scaffold each response with a follow up question for the next stem.

The routine works well in a group discussion but in some cases you may want to ask students to try the routine individually on paper or in their heads before sharing out as a class. Student responses to the routine can be written down and recorded so that a class chart of observations, interpretations and wonderings are listed for all to see and return to during the course of study.

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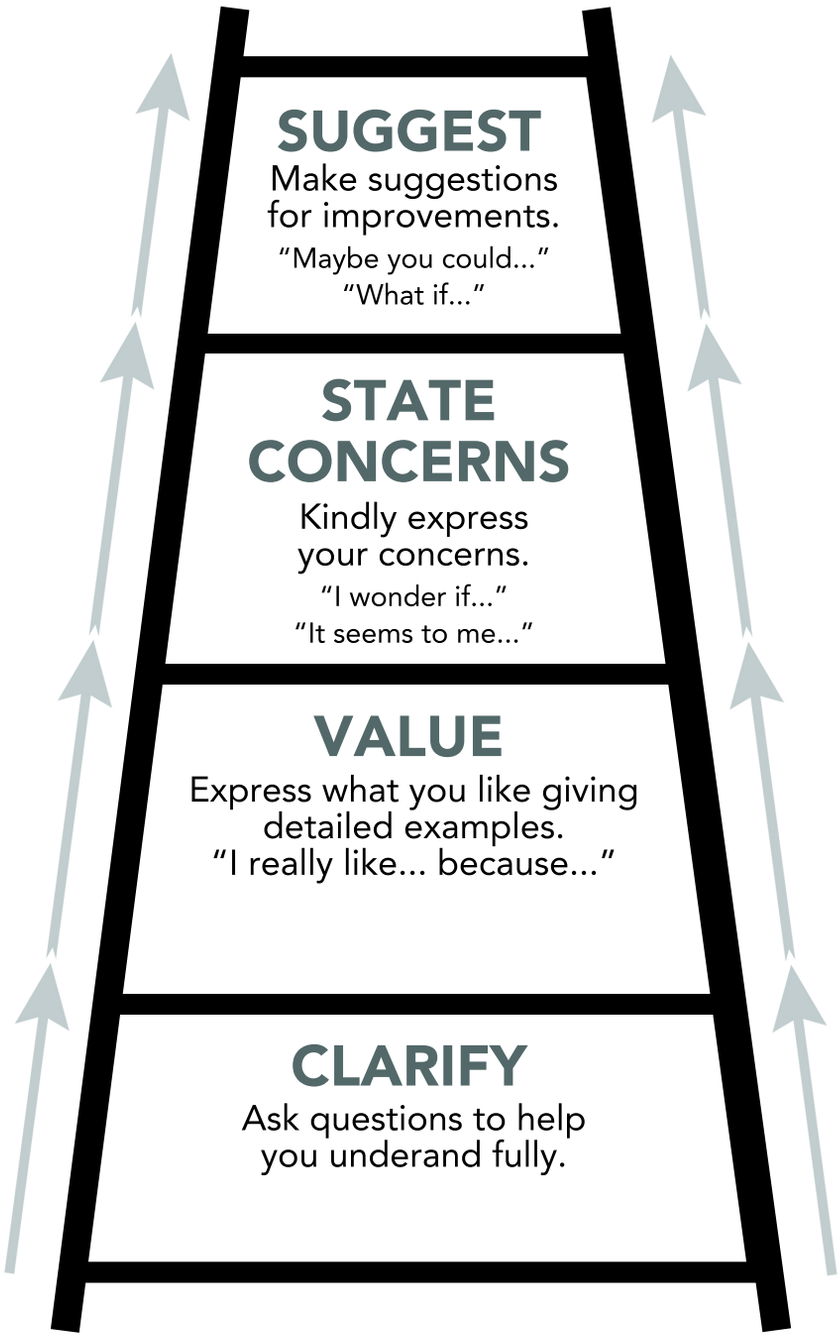
PROJECT ZERO
HARVARD GRADUATE SCHOOL OF EDUCATION

The Ladder of Feedback

Developed by David Perkins*



* David Perkins is the Carl H. Pforzheimer, Jr., Professor of Teaching and Learning, Emeritus, at the Harvard Graduate School of Education (HGSE) and a Principal Investigator at HGSE's Project Zero where he was the founding co-director for nearly 30 years.

Connect, Extend, Challenge

A routine for connecting new ideas to prior knowledge

CONNECT:	How are the ideas and information presented CONNECTED to what you already knew?
EXTEND:	What new ideas did you get that EXTENDED or pushed your thinking in new directions?
CHALLENGE:	What is still CHALLENGING or confusing for you to get your mind around? What questions, wonderings or puzzles do you now have?

Purpose: What kind of thinking does this routine encourage?

The routine helps students make connections between new ideas and prior knowledge. It also encourages them to take stock of ongoing questions, puzzles and difficulties as they reflect on what they are learning.

Application: When and where can it be used?

The natural place to use the Connect-Extend-Challenge routine is after students have learned something new. It doesn't matter how much they have learned – it can be a lesson's worth, or a unit's worth. The routine is broadly applicable: Use it after students have explored a work of art, or anything else in the curriculum. Try it as a reflection during a lesson, after a longer project, or when completing a unit of study. Try using it after another routine!

Launch: What are some tips for starting and using this routine?

This routine works well with the whole class, in small groups or individually. Keep a visible record of students' ideas. If you are working in a group, ask students to share some of their thoughts and collect a list of ideas in each of the three categories Or have students write their individual responses on post-it notes and add them to a class chart. Keep students' visible thinking alive over time: Continually add new ideas to the lists and revisit the ideas and questions on the chart as students' understanding around a topic develops.

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I USED TO THINK...
NOW I THINK...

A routine for reflecting on how and why our thinking has changed

Remind students of the topic you want them to consider. It could be the ideal itself — fairness, truth, understanding, or creativity — or it could be the unit you are studying. Have students write a response using each of the sentence stems:

I used to think.... **But now, I think...**

Purpose: What kind of thinking does this routine encourage?

This routine helps students to reflect on their thinking about a topic or issue and explore how and why that thinking has changed. It can be useful in consolidating new learning as students identify their new understandings, opinions, and beliefs. By examining and explaining how and why their thinking has changed, students are developing their reasoning abilities and recognizing cause and effect relationships.

Application: When and where can it be used?

This routine can be used whenever students' initial thoughts, opinions, or beliefs are likely to have changed as a result of instruction or experience. For instance, after reading new information, watching a film, listening to a speaker, experiencing something new, having a class discussion, at the end of a unit of study, and so on.

Launch: What are some tips for starting and using this routine?

Explain to students that the purpose of this activity is to help them reflect on their thinking about the topic and to identify how their ideas have changed over time. For instance:

When we began this study of _____, you all had some initial ideas about it and what it was all about. In just a few sentences, I want to write what it is that you used to think about __ . Take a minute to think back and then write down your response to " I used to think..."

Now, I want you to think about how your ideas about _____ have changed as a result of what we've been studying/doing/discussing. Again in just a few sentences write down what you now think about _____. Start your sentences with, "But now, I think..."

Have students share and explain their shifts in thinking. Initially it is good to do this as a whole group so that you can probe students' thinking and push them to explain. Once students become accustomed to explaining their thinking, students can share with one another in small groups or pairs.

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Question Starts

A routine for creating thought-provoking questions.

1. **Brainstorm** a list of at least 12 questions about the topic, concept or object. Use these questionstarts to help you think of interesting questions:

   Why...?
   What are the reasons...?
   What if...?
   What is the purpose of...?
   How would it be different if...?
   Suppose that...?
   What if we knew...?
   What would change if...?

2. **Review** the brainstormed list and star the questions that seem most interesting. Then, select one or more of the starred questions to discuss for a few moments.

3. **Reflect**: What new ideas do you have about the topic, concept or object that you didn't have before?

Purpose: What kind of thinking does this routine encourage?

This routine provides students with the opportunity to practice developing good questions that provoke thinking and inquiry into a topic. It also helps students brainstorm lots of different kinds of questions about a topic. The purpose of asking deep and interesting questions is to get at the complexity and depth of a topic. The purpose of brainstorming varied questions about a topic is to get at the breadth and multi-dimensionality of a topic.

Application: When and where can it be used?

Use Question Starts to expand and deepen students' thinking, to encourage students' curiosity, and to increase their motivation to inquire. This routine can be used when you are introducing a new topic to help students get a sense of the breadth of a topic. It can be used when you're in the middle of studying a topic as a way of enlivening students' curiosity. And it can be used when you are near the end of studying a topic, as a way of showing students how the knowledge they have gained about the topic helps them to ask ever more interesting questions. This routine can also be used continuously throughout a topic, to help the class keep a visible, evolving list of questions about the topic that can be added to at anytime.

Launch: What are some tips for starting and using this routine?

Before using Question Starts, you might want to ask students what they think makes a good question. Then, when you show the Question Starts, explain that this routine is a tool for asking good questions. Start the routine by providing a topic– Stockholm, a compass, the Equator, good sportsmanship. Ask them to use the Question Starts to generate a list of questions about the topic. Initially, it's best to work together as an entire group. Once students get the hang of the routine, you can have them work in small groups or even solo. Or mix it up. For example, do step 1 as a whole class, do step 2 in pairs, and step 3 as a whole class again.

After students finish generating questions, you can use the questions they created in a variety of ways: pick one of the questions to investigate further, have a discussion about some of the questions, give students information to read about the topic, ask them to investigate it in other ways, or do nothing further as simply creating the list of questions is worthwhile since it gives students a sense of the breadth of a topic and sparks curiosity about it. Students' questions can be written down and recorded so that they are listed for all to see. If students are working solo, they can keep their list of questions in a journal, or you can create a "collage" out of students' individual lists and display it on the classroom wall.

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Final Reflection Prompts

Two stars and a wish

What are two things you would like to keep?
(You could also substitute "one or two new insights or things you were inspired by")

What is something you would like to happen next time?

"IQ": Insight / Question

Share one insight and one question.

Is there any other feedback you would like to share about today's session?

Plus/Delta

+ What went well?

▲ What would you like to change?

The principles, practices and ideas behind our Pedagogy of Play

Principles of a Pedagogy of Play

The principles of a Pedagogy of Play (PoP) offer six core beliefs about learning through play in schools. The principles are the result of PoP research at ISB, three schools in South Africa, and a review of the existing literature about learning through play. At ISB, teachers, administrators, and researchers from Project Zero at the Harvard Graduate School of Education developed the principles collaboratively; they will evolve over time as PoP research continues.

1. Play is a core resource for learning.

When people play they are engaged, relaxed, and challenged — states of mind highly conducive to learning. Through play, children and adults try out ideas, test theories, experiment with symbol systems, explore social relations, take risks, and reimagine the world. They develop agency, empathy, and their imaginations. They learn to deal with uncertainty. While not all learning has to be playful, nor does every moment of playfulness involve significant learning, a close look at play and playfulness reveals numerous emotional, social, and cognitive features that can powerfully abet learning. Sometimes these features help to make learning feel fun and enjoyable; sometimes they help learning proceed in more engaging and exploratory ways.

2. Learning through play in schools involves play with a purpose.

Schools are places where young people come to learn the important skills, knowledge, and dispositions needed to be contributing members of their communities. While we are big supporters of unstructured, child-directed "free-play," a pedagogy of play in schools involves play with a purpose, bringing together educators' learning goals and students' natural ways of learning through play. Playful learning situates curricular goals, content, and activities within a larger purpose of helping learners understand, explore, and shape their world.

3. The paradoxes between play and school complicate bringing playful learning and teaching together.

Bringing play and school together is not easy or straightforward because of the paradoxical relationship between play and school. For example, play is timeless... players lose themselves in play. School, on the other hand, is timetabled. Play can be chaotic, messy, and loud; schools aspire to be places of order. In play children are in charge, while at school the agenda is generally set by adults. Play involves risks, whereas in school we aim to keep children safe. Why are these paradoxes? Because both sides of these statements are true: we want children to explore and experiment and we don't want them to get hurt. Creating a culture of playful learning requires inquiry-oriented teaching, and ongoing conversations among a school faculty to navigate these paradoxes.

4. Learning through play is a mindset with playfulness as the active ingredient.

Learning through play involves students and teachers approaching learning with a playful mindset. Beyond integrating a game or activity into a lesson, embracing a pedagogy of play means activating mindsets where learners and teachers frame and reframe experiences as occasions to be curious, creative, and imaginative, and to find joy in exploring the "what if..." space of learning and play. While games and activities can help encourage these mindsets, learning through play requires more than isolated curricular moves. Playfulness and having a playful disposition (for learner and teacher) are active ingredients for learning through play.

5. Play and playfulness thrive in supportive school cultures.

Playful learning is rarely a solo endeavor. The ability to learn through play thrives in supportive school cultures for students and teachers. While small steps can be taken to bring more playful learning to a classroom, sustained change depends on developing a school culture of trust among children and adults. While there are various entry points to begin developing a culture where playful learning thrives, a pedagogy of play involves rethinking the relationships between teachers and students and a re-evaluation of what learning comprises. In addition, a culture of playful learning for children requires a culture of playful learning for adults. In such schools, educators are supported in taking risks, trying out ideas, and tinkering with their practice. With a playful approach to their practice, educators engage in responsible experimentation.

6. Learning through play is universal and shaped by culture.

People around the world play and have the ability to learn from that play. At the same time, play is a cultural construct. Whom children play with, how they play, where and when they play, and what age they should stop playing (if ever!) are determined by cultural contexts. The form and content of playful learning therefore varies depending on the context.

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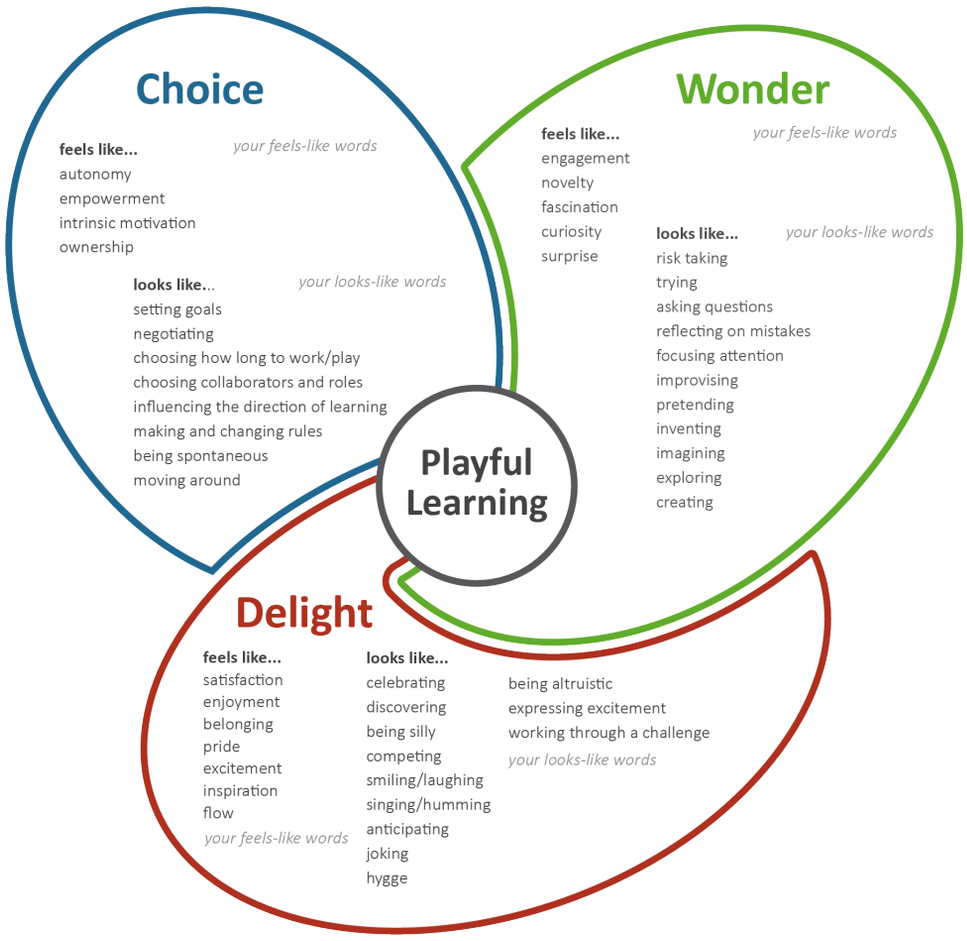
Indicators of Playful Learning at ISB

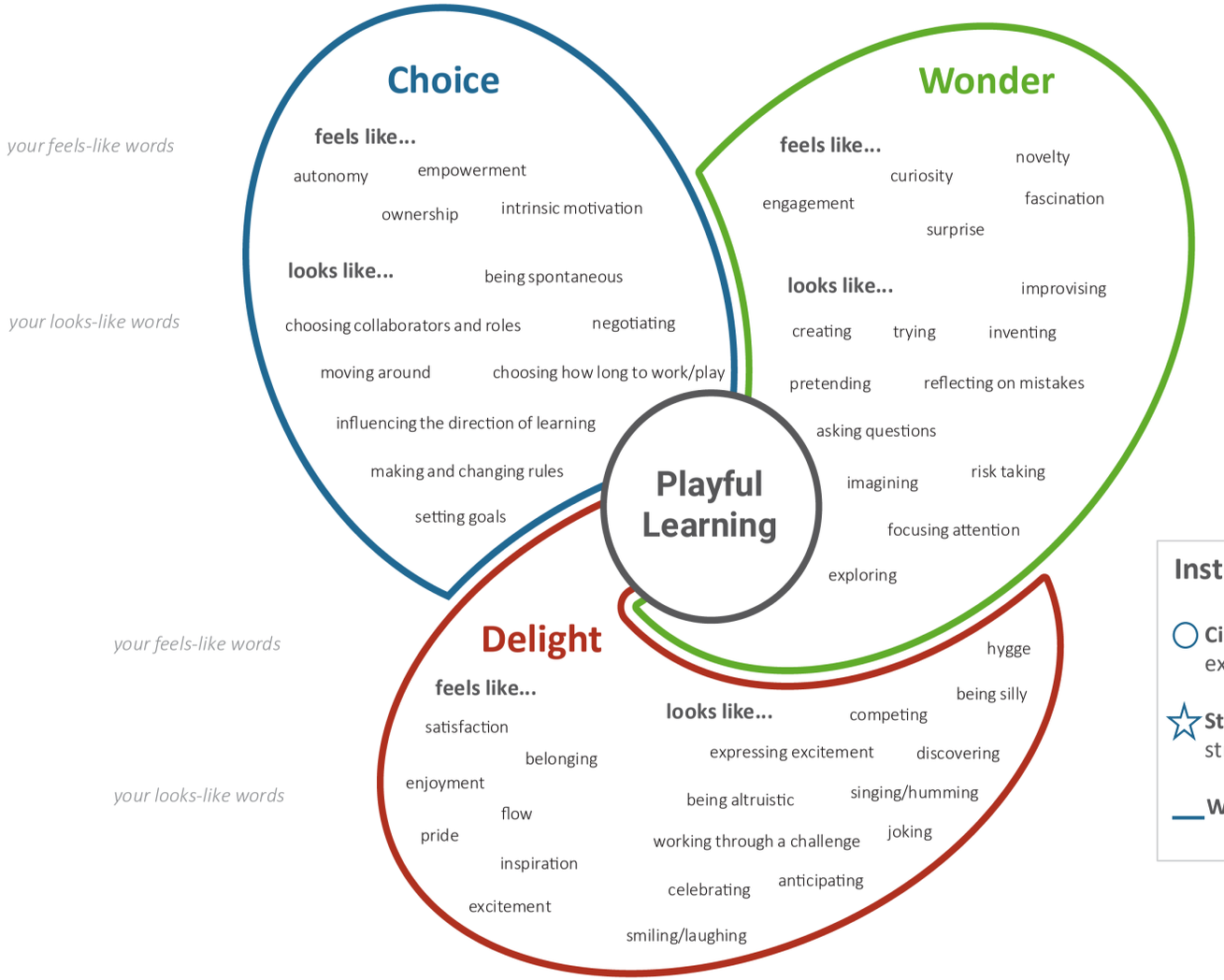
The ISB Indicators of Playful Learning represent what learning through play looks and feels like at ISB. The indicators of playful learning are divided into three categories — **choice**, **wonder**, and **delight** — that describe the nature of learners' experiences as they build understanding, knowledge, and skill through playful learning. Each category includes markers that describe different aspects of playful learning. Markers can be subjective — representing what the experience feels like to the learner, or they can be objective — representing what the experience looks like to an outside observer. When indicators from each category are present, playful learning is likely to be occurring.

The indicators are a result of a collaborative effort between teachers and administrators at ISB and researchers from Project Zero. The indicators were developed based on observations at ISB, interviews with ISB teachers, documentation of student and teacher learning, and a survey of the research literature. The markers may evolve over time as the pedagogy of play work continues at ISB.

In this guide, the indicators of playful learning appear in two formats. The first (see below) is the indicators themselves. The second (see next page) is a tool for educators or students to use when observing or reflecting on a playful learning experience.



ISB Playful Learning Observation & Reflection Tool



Instructions

- **Circle** indicators that you experienced or observed
- **Star** the ones that felt strongest
- **Write** in anything missing

pedagogy of play

International School of Billund

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Practices that promote playful learning

A pedagogy of play involves bringing play and playfulness into many aspects of school life: teaching, learning, assessment, the classroom environment, and school culture. Here, we share five core practices that promote choice, wonder and delight.

- **Empower learners to lead their own learning**
- **Build a culture of collaborative learning**
- **Promote experimentation and risk-taking**
- **Encourage imaginative thinking**
- **Welcome all emotions generated through play**

On the following pages we describe each practice and suggest associated teaching strategies that support playful learning.

Some of these practices and strategies were developed at ISB. Others we learned about from other educators and adapted them to work for us. We encourage you to do the same, building on what you are already doing to create a culture of playful learning at your school.

Practices that promote playful learning (2020).
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Empower learners to lead their own learning

Taking playful learning seriously means tipping the balance of responsibility for learning toward learners. Look for opportunities to turn things over to students and support them in this process. This requires flexibility and a willingness to modify teaching plans.

Get to know your learners

Understanding the strengths, knowledge, and interests of your learners is a vital part of making learning relevant to their lives. To get to know your learners, observe their play, have informal conversations about their lives and passions, and connect with their families.

Co-construct rules

Share power with children by co-constructing or reshaping classroom rules and norms. When students are included in creating classroom expectations, they experience agency, a sense of belonging, and an investment in the learning community.

Say yes to students' spontaneous ideas

Playful learning involves being open to serendipity and surprise. When students make playful suggestions, consider whether the idea might actually enhance, or at least not distract from, the learning goals.

Reflect on learning with learners

Take time to reflect on playful learning experiences with students. When learners better understand how they are learning, they become equipped to co-construct and/or lead the learning process.

Involve learners in decision-making

Engaging learners in decisions about the curriculum, assessment, and classroom environment can activate feelings of wonder and delight. Invite students to participate in both large decisions (e.g. what topics to study, how to arrange classroom furniture and space) and small choices (where to sit, with whom to partner) about learning.

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Build a culture of collaborative learning

Feelings of playful learning are often activated and sustained by being part of a group. Playful learning is enhanced when players exchange, build on, or disagree with each other's ideas. Set up the conditions for collaborative learning so that students have opportunities to learn with and from each other.

Use play to build relationships

Through play, children build the trust, empathy, and relationships that allow them to learn together. Deepen your own relationships with students by joining in their play.

Facilitate purposeful conversations to build knowledge

In classrooms that operate as collaborative learning spaces, individuals work together to build knowledge as a group. Thinking routines and discussion protocols are helpful in providing the structure that promotes knowledge-building as a group.

Nurture a culture of feedback

Feedback from peers and adults can be invaluable to the learning process, yet giving and getting feedback can be scary. Build a classroom culture in which learners give and receive kind and specific feedback.

Foster peer-to-peer teaching

Children can be effective teachers. Recognize that the adults are not the only teachers in the room and provide opportunities for children to learn from one another. Instead of providing answers, redirect questions back to learners so they can discuss and explore with each other.

Document learning through play

Making learning visible enhances a culture of collaboration. Document learning experiences through video, written notes, photographs, and samples of students' work. Revisit this documentation with the learners, other educators, and families to gain important insight about next steps for teaching and learning.

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Promote experimentation and risk-taking

A playful classroom provides a safe space for learners to experiment with materials and ideas, as they take risks, try new things, and work through frustration. Nurturing a culture of exploration helps children develop creative thinking skills and provides opportunities for them to see risk-taking and learning from failure as important parts of the learning process.

Design open-ended investigations

Learning experiences with unknown outcomes (for learners and teachers) are invitations to discovery. Provide materials that inspire experimentation and pose questions that lead to sustained inquiry.

Value risk-taking as a strategy for learning

Children learn when they try out new ideas, make mistakes and try again. Normalize risk-taking, mistakes, and failing forward as valuable aspects of learning by celebrating them and making them visible to the class.

Focus on process as well as product

When engaging in experimentation and iteration, a focus on process as well as product allows students to demonstrate their understanding throughout a learning experience, not just at the end. Peer critique, process-folios, and performative assessments provide valuable feedback to shape teachers' and learners' next moves.

Model risk-taking and experimentation

Many of the practices involved in playful teaching require some degree of risk-taking on the part of educators. Be transparent about showing students what risk-taking and experimentation can look like in teaching.

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Encourage imaginative thinking

Engaging the imagination brings learners into the what if space of learning, where students explore, create, invent, generate new ideas, and take different perspectives. Learning can deepen when students move between different ways of expressing themselves.

Share stories to engage and enhance learning

Telling stories and constructing narratives are a central way people connect to, understand, and explore ideas. Encourage learners, regardless of age, to listen to and tell stories as a way to explore content and share personal experiences.

Ask questions that invite curiosity

Questions with multiple answers are invitations to play with ideas. For instance, rather than asking students to design a car, ask them to design a way to get from home to school. Such questions open up opportunities for further learning.

Provide materials that encourage hands-on learning

Cardboard boxes, paint, rocks, and other found and natural materials engage the senses and offer learners the opportunity to create, explore, and imagine. Tinkering and maker-centered learning provide opportunities for exploring the properties of materials, problem solving, and messing around with ideas.

Use role play and pretend scenarios

Role play allows learners of all ages to explore ideas and issues from different perspectives. Asking students to demonstrate what they know through role play and pretend scenarios can put them at ease and be a valuable assessment strategy.

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Welcome all emotions generated through play

Learning through play can involve a range of emotions, including feelings of enjoyment, satisfaction, and ownership, as well as frustration and even anger. It is important to welcome and value all of these emotions.

Design for delight

Often we find that lessons designed with choice and wonder in mind lead naturally to feelings of excitement, belonging and pride. Designing joyful lessons can be particularly helpful when skill-building and repetition are needed (e.g., spelling, multiplication tables, or practicing an instrument).

Make learning meaningful and relevant

Learning is engaging and meaningful when it connects to students' interests, lives, and important issues in the world. Making links between curriculum and community and between home and school life can create excitement, curiosity, and a sense of belonging.

Use play to explore complicated issues

Using stories, hands-on materials, role-play, or pretense can provide a unique way to engage with sensitive topics (like racial inequity, war, or poverty) and navigate conflict and disagreement.

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Frequently Asked Questions

On Research Questions

How do I know if my research question is good?

There are a number of factors that go into making a good research question. Most importantly, your question should be about play and learning and be relevant to your daily work. Sometimes research questions of interest might end up feeling like an extra project that you find it hard to make time for. Choose a question that will support your daily routines and teaching. For example, is there something that you are working on in relation to playful learning — perhaps maths lessons, social-emotional behaviour, or your classroom set-up—that you would like to learn more about? Research questions can also provide a wonderful opportunity to pause and think about things that you might want or need to turn your attention to, but haven't yet done so. For example, are there students you would like to gather more information about? Are there new ideas around playful learning you would like to try? For more ideas about how to turn your interests into a research question, see *Developing a Research Question* on page 18.

What if I want to change my research question?

Sometimes you might remain interested in a research question for months, an entire school year, or beyond. Other times, in the process of exploring a question, your interests may change. You might start by examining one topic, and what you discover in your documentation may lead you to another question. In other scenarios, you may find that once you delve into a topic, you are not nearly as interested in it as you thought you were. There is no right answer about when it is time to move onto a different research question. Consult with your documentation team, your fellow study group members, and your study group facilitator(s) as you think through which question you would like to explore and how long it feels right to continue with it.

On Documentation

What do we mean by documentation?

Documentation is a key practice in PoP study groups that supports teacher research with the goal of deepening learning—your learning as educators, the learning of students, and perhaps learning in the wider community. Documentation helps to ground conversations about learning in something tangible that people can point to in order to back up their interpretations about where they see learning taking place. However, the term "documentation" can also be confusing because it can refer to parts of the process of documenting, as well as the entire process itself.

Documentation might refer to:

- Physical artifacts (such as student work or quotes, photographs, video)
- The process of collecting artifacts
- A visual panel that includes artifacts and analysis (such as some of the panels at the May Celebration)
- The entire process of documenting (see definition in next paragraph)

One reason the word "documentation" can be used in so many different ways is because the parts of the documentation process tend to blend into one another. Recording (collecting artifacts) is premised on observing and requires interpretation (for example, where to point the camera and when to press record). The artifacts used in study group sessions to ground discussion and debate might also be used in a panel to illustrate a point. The many meanings of documentation require that we are as clear as possible about how we are using the term. For the purposes of this guide and PoP work at ISB, we define documentation as "the practice of observing, recording, interpreting, and sharing through different media the processes and products of learning in order to deepen learning" (Krechevsky et al., 2013, p. 74*).

We recognize that documentation can be a challenging concept, hence we provide several tools and resources in this guide to support your understanding:

- *Documentation Planner* on page *19*
- *Taking Stock of Your Research* on page *20*
- *Documentation vs. Display: What is the difference?* on page *21*
- *Documentation: When does it make learning visible?* on page *22*
- *Quick-Start Guide to Documentation* on page *23*

What if I feel like my documentation is not helping me learn about my research question?

First, are you more interested in your research question or in what you are learning from your documentation? Sometimes, in the process of documenting, the data you gather pull you in a different direction, and you discover a new research question or a new aspect of your question. In this case, consider changing your research question.

If this is not the case, ask yourself why you are not learning about your question.

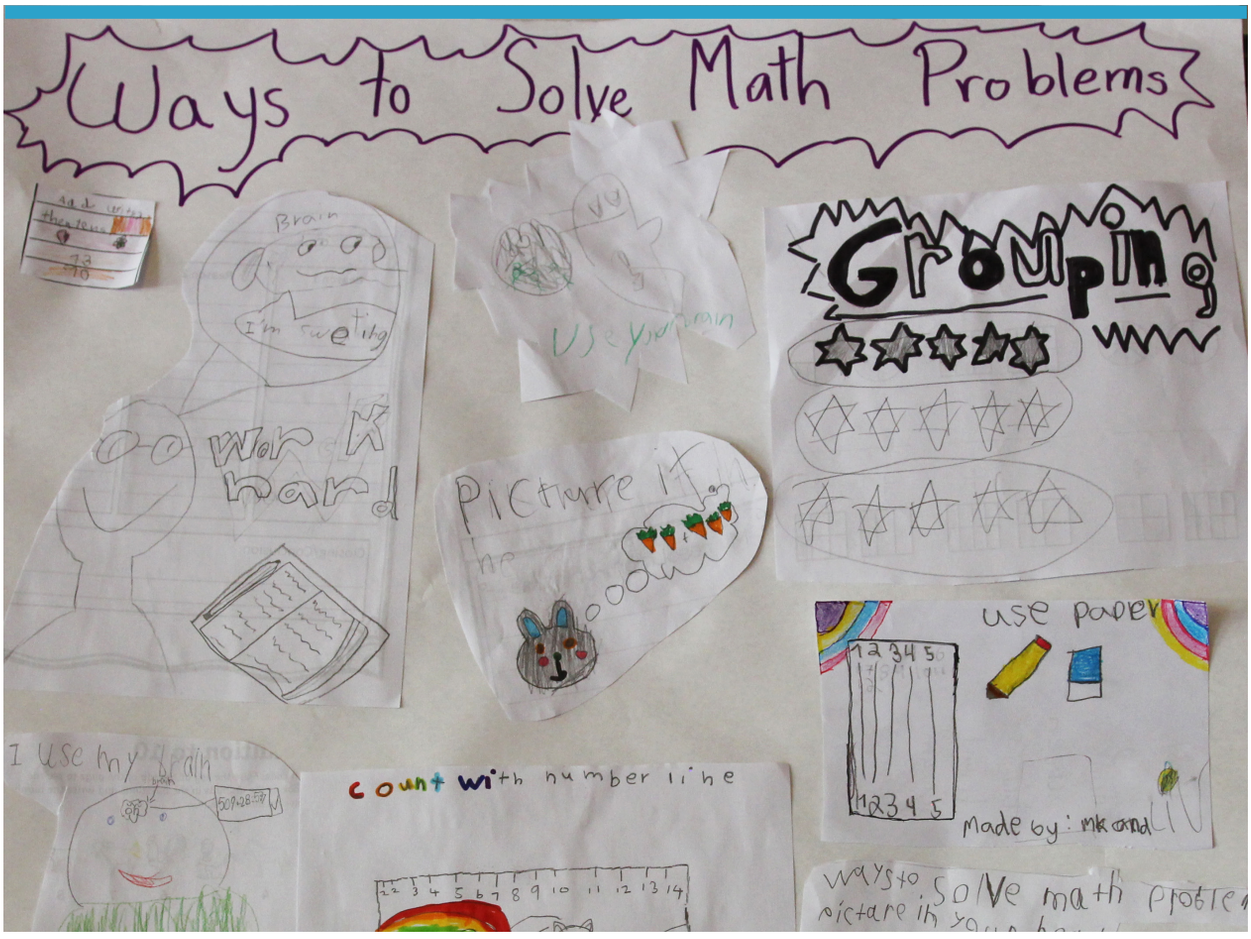
- Is there too much documentation to go through? Consider collecting less. Only collect as much documentation as you have time to revisit!
- Does your documentation question need to be narrowed? Perhaps you need to focus only on a particular group of students, lesson, or subject during a given timeframe.
- Is the documentation you are gathering helping you see evidence of student learning? Try gathering documentation that is heavy on student voice and work (e.g., small group work or students asking questions or explaining their thinking) and light on teacher voice (e.g., whole group work where the teacher does most of the talking).

* Krechevsky, M., Mardell, B., Rivard, M., & Wilson, D. (2013). *Visible learners: Promoting Reggio-inspired approaches in all schools.* John Wiley & Sons.

There were great moments happening in my class, but I did not get to document them. What should I do?

Depending on what you want to use the documentation for, you can always revisit the moments and try to recollect the learning with your students. You can also think ahead to future moments! The nature of teaching is such that you will never capture all of the moments that, in retrospect, you wish you had captured. That said, there are a number of things that you can do to be prepared for next time, including:

- Keep documentation tools easily accessible. Have an iPad or camera nearby, charged, and with sufficient memory to store your documentation. You might also have a notepad nearby just for documenting, or put slips of paper in containers around your classroom with a pen to jot down a quote. These slips of paper might be blank or provide prompts (see the next page for an example). In short, anticipate that you will not be able to plan for unexpected moments of thinking or learning that you would like to capture, and set up your learning area accordingly.
- Establish documentation as a regular part of your classroom routine, for both you and your children. Like any skill, the more you document, the more nuanced your ideas about how, when, and why to document will become.
- Have a conversation with your students ahead of time about the goals and value of documenting so they become familiar with the process and are not surprised when it happens. You can also ask children to assist in documenting (see more details in the question below).
- You might keep a running list of moments you miss in order to see if there are any patterns. Do they happen during group work? With a particular student? In one area of the room?



Documentation Notes

Children: _____

Documenter: _____ Date / Time: _____

Location / Area: _____ Activity: _____

Notes:

_____

_____

_____

_____

_____

_____

_____

_____

How do I ensure that documenting doesn't interfere with the flow of teaching and learning?

An important purpose of documenting learning is to inform teaching and learning. In this sense, documentation is part of the teaching and learning process and not something separate. However, you can help facilitate this process by following one or more of these tips:

- Explain to students why and how you, a colleague, or other students will be documenting.
- Plan to document when students are directing their own learning.
- Do not try to do too much. If your students are working on different projects, choose one to focus on which is most closely related to what you want to learn.
- Try using an audio or video recorder, turning it on, and then leaving it in the corner of a room or on a table where a group is working. As salient moments arise that you would like to revisit, jot down the time they occur. This will ensure that when you listen to the documentation later, you can turn your attention to the most relevant moments.
- Ask a co-teacher or another adult to take the lead in teaching and checking in with students while you document. Or you might ask a colleague to help document, and then return the favour. Parents, grandparents, or guardians (with some training) can also be enlisted to help.
- Ask a student(s) to document. Students are often excited to help gather data on themselves. Talk to students ahead of time about how they might document and why. Give them a few minutes to experiment with the equipment before beginning to document. Depending on your purpose, consider sharing the documentation back with students afterwards.

I keep meaning to document, but don't feel like I have the time. What should I do?

Documenting for PoP study groups should be something you can fit into your regular teaching practice. This can be challenging, especially as a beginning documenter.

A few tips:

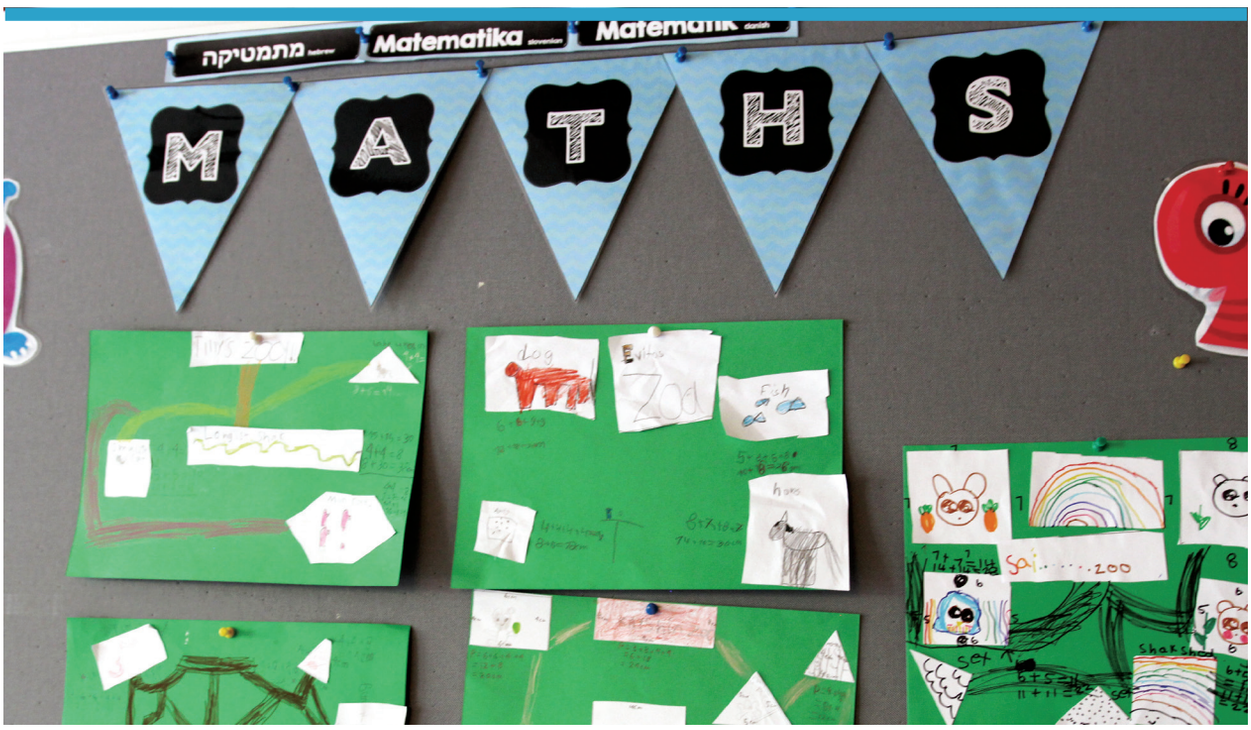
- Make sure your research question is something that is relevant to your daily work.
- Once you know your purpose, make a plan for when and how to document
- Team up with a colleague
- Enlist student help

How do I role model good consent behaviour to my students while documenting?

At ISB, our _____ policy is _____. Documentation follows the same rules. Know which students are media-approved and which aren't. When documenting, know the audience for your documentation; some students are media-approved for internal, but not external, use. Talk to students ahead of time about why you will be audio/video recording or taking photos, explaining their intended use.

How do I know when my documentation is good enough to share?

Documentation need not be a polished product. Instead of thinking of documentation as being good enough, focus on two criteria when selecting documentation to share in your study group: Does the documentation connect to your research question? Does the documentation reflect students' learning through play in a way that will allow people sitting around a table to enter into a conversation about it? Remember, the documentation you share in study groups, whether short video excerpts of students talking or working, photographs paired with quotes from students, or short audio recordings, should not yet include your interpretation. See *Documentation: When does it make learning visible?* on page 22 for additional guidance.

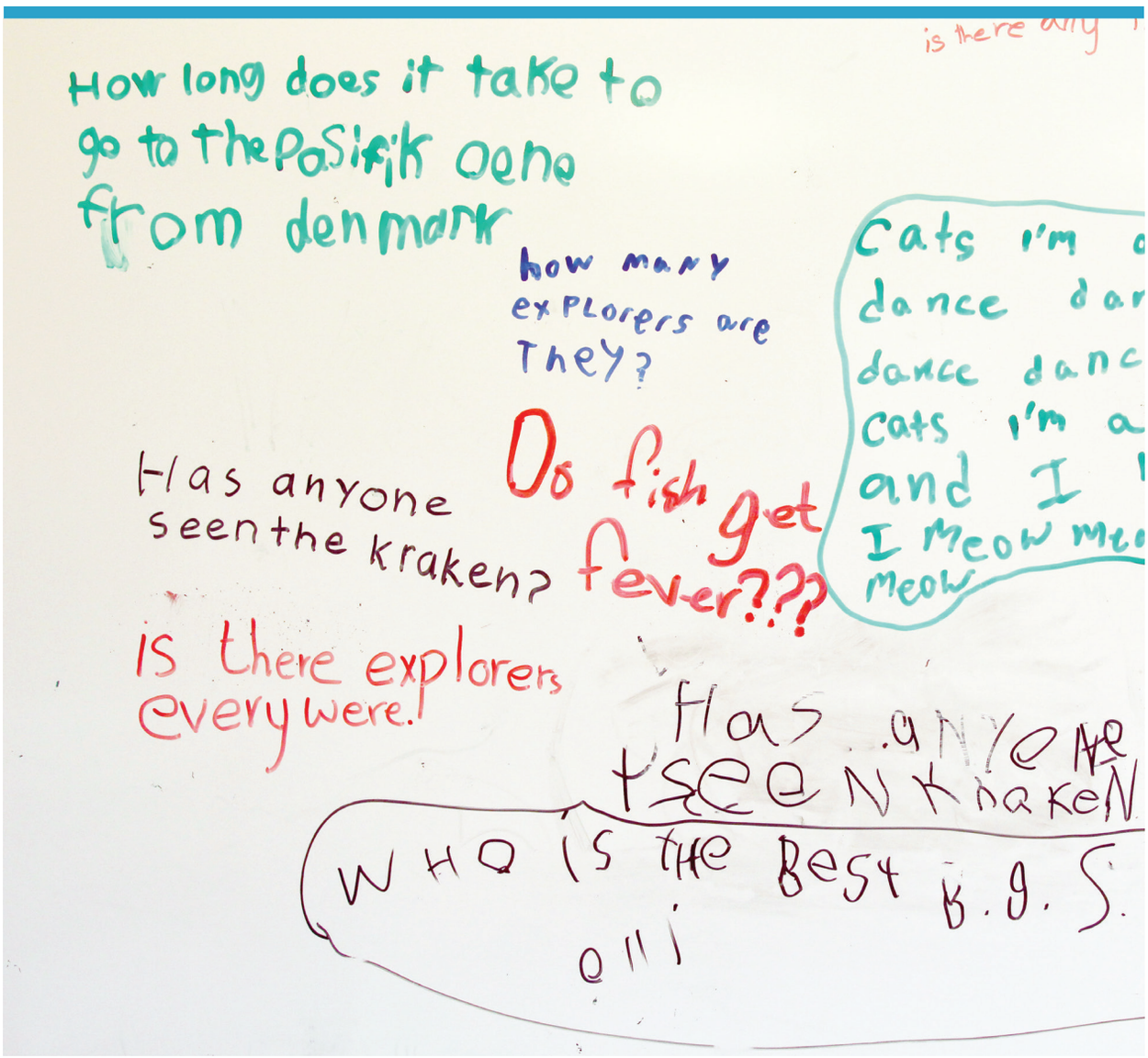


How do I decide which documentation to share with my study group?

As noted in previous questions, choosing which part of your documentation to share with others depends on what your question is and what you would like to get out of the conversation. See *Designing and Facilitating Adult Study Groups* on page 29 and *Documentation: When does it make learning visible?* on page 22 for additional considerations. In deciding what to share, you might be in touch with your study group facilitator or meet with other members of your study group to decide what selection will best support what you want to learn. In general, you want to share "raw" documentation rather than something you have already interpreted.

How much time should I spend preparing my documentation?

Documentation can be prepared during your weekly PoP In times. Limiting the documentation you collect will keep the preparation manageable. Focus your review on the pieces that are likely to be most relevant for answering your question. On average, you might spend one PoP In time preparing your documentation for your study group meeting.



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