

NCCA Primary Mathematics Toolkit – Support material

Promoting maths talk in the classroom

Opportunities for maths talk

Maths talk is a collaborative process where children's thinking, strategies and ideas are expressed, shared and/or exchanged. This support material outlines an approach used to illustrate how opportunities for maths talk or 'talk moves' can happen at different phases of a maths lesson. It can be flexibly built into lessons for teacher- and child- led approaches to maths talk. Using talk moves in a meaningful way can support children's understanding in mathematics as well as help foster their productive dispositions.

Did anyone get a different answer?



Phase of lesson

What is happening

Possible talk moves

Initial phase

Introduce a meaningful task or problem to the class.

If the task selected is linked to a recent learning event, children may be prompted to bring prior learning and/or misconceptions to mind.

- Say more/Clarifying
- Repeating

Independent phase

Children undertake the task independently and are given ample time to think for themselves about the task.



Sharing phase

Small group sharing (children work in pairs, trios or groups)

The intention is to help children clarify and share their own thoughts; orient to the thinking of others; deepen their own reasoning; and to engage with the reasoning of others.

Having had adequate time to think and engage with the tasks independently, children are given an opportunity to

share their ideas, thinking or strategies and to collaborate to further develop or refine their response to the task.

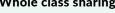
Wait time

Turn and talk

What strategy did you



discussion. Teachers may select from a range of talk moves to facilitate children in sharing strategies, concepts, procedures, representations, and/or explanations they have used to tackle the task. The teacher's role is to help the children compare and connect their approaches to



This open sharing phase is teacher-led classroom tackling the task using one of more of these possibilities:

- Revoicing
- Say more/Clarifying
- Repeating
- Reasoning/ **Elaborating**
- Agree/Disagree
- Adding on



draw a picture to show that?

Can you

Focusing phase

At this point, the teacher orients the children towards a viable and efficient strategy, procedure, representation, and/ or explanation. Helping the children to use it correctly is vital.

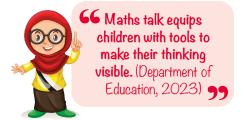
Audit of learning environment



Promotion of maths talk

When thinking about promoting maths talk in your classroom you might find the following questions helpful.

Ask yourself the following questions:	Sometimes	Always	Never
Do I have the expectation that children can learn correct mathematical language?			
Do I model correct mathematical language?			
Do I encourage children to use correct mathematical language?			
Do I use questions to prompt rich mathematical discussion?			
Do I think out loud about my mathematical ideas?			
Do I allow time for children to reflect on their learning?			
Do I provide opportunities for children to discuss their thinking and justify their answers?			
Do I encourage large group, small group and pair discussion of mathematical ideas?			
Do I read books with mathematical ideas embedded in the story which provide context for using mathematical language?			
Do I have the expectation that children will listen to each other and try to understand the explanations?			
Do I have a focus on children explaining the strategies used, rather than on the right answer?			
Do I encourage children to say why they agree or disagree with other child's explanation or ask questions to help them understand?			





References

Department of Education (2023). *Primary Mathematics Curriculum For Primary and Special Schools*. Dublin: Department of Education.