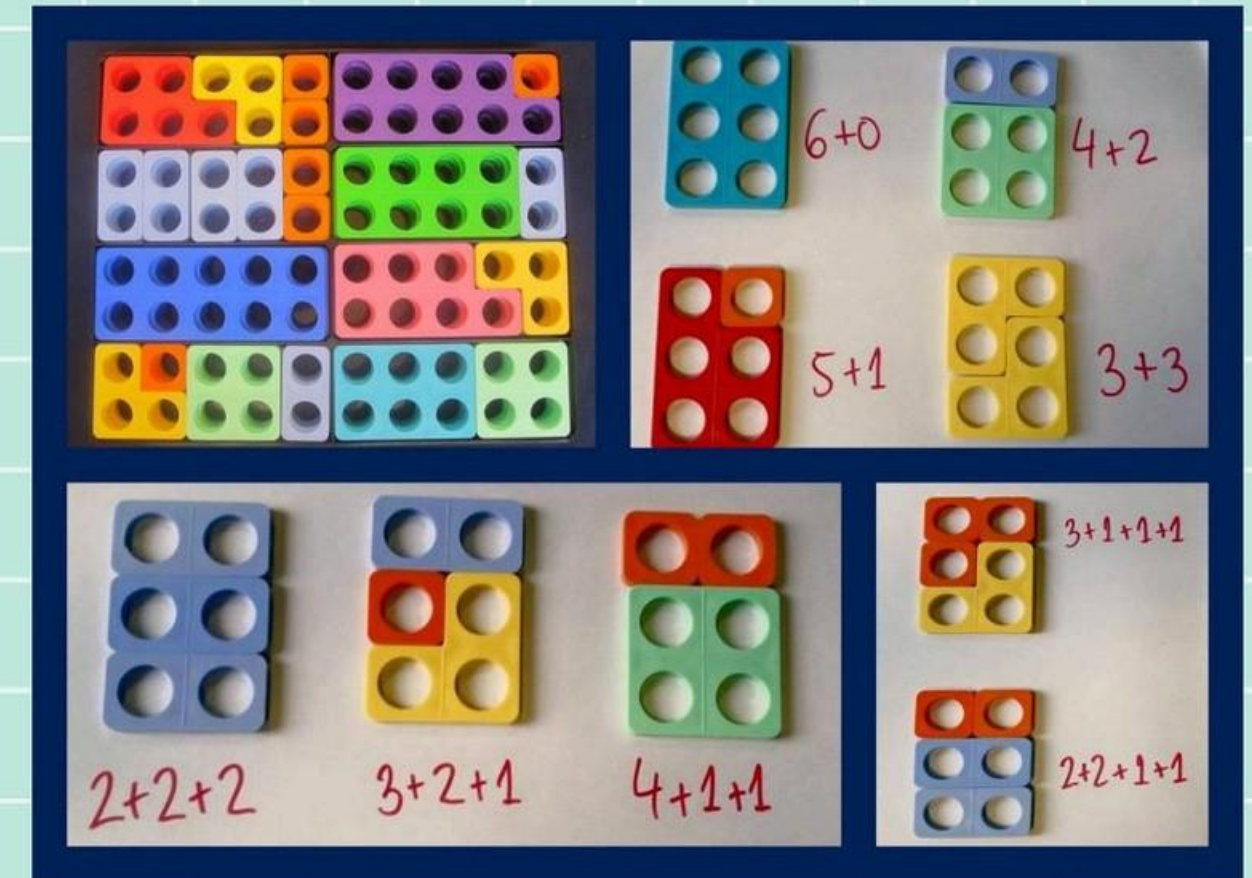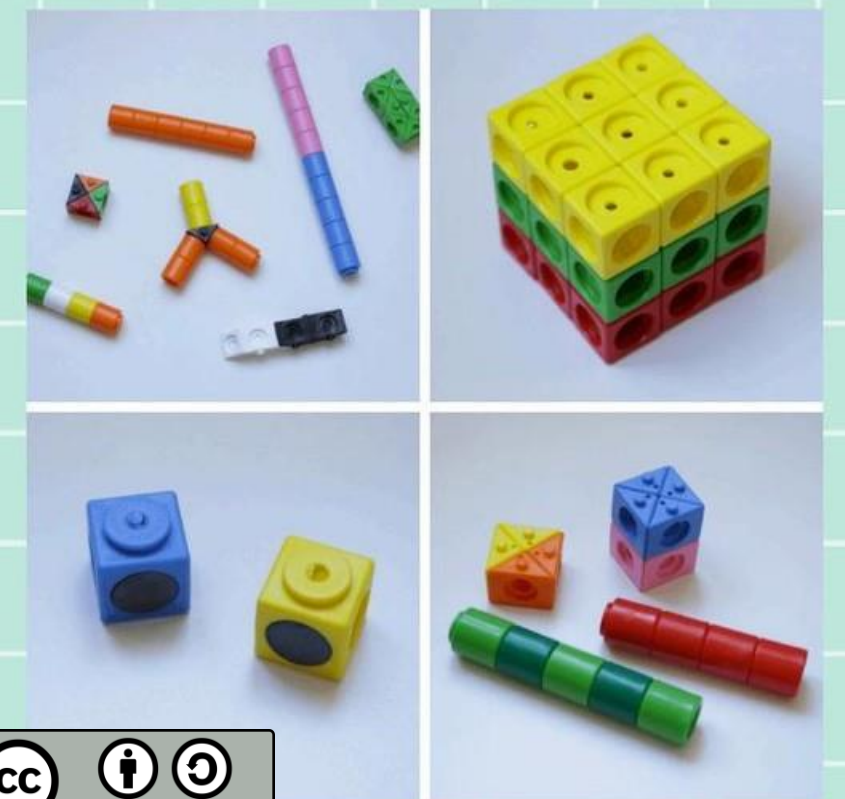# Playful manipulative materials (6-8 years)

• Colored tweezers to place the first numbers naturals on the number line

• Numeric panels

• Polycubes

• Montessori cards and rules for the composition and decomposition of

• Numerical material by G. Mialaret

• Children's numerical scale

• Various materials to build the first multiplication tables

(Alsina, A. 2010)

Playful manipulative materials

Games 8-10 years

- Abacuses for understanding the Decimal Numbering System, for make comparisons
- Glasses to compose numbers

- Rulers for understanding multiplication: properties and division as distribution

- Concrete materials,

rules and circular panels for the first

fractions, equivalences

- Freudenthal fraction table for the first operations with fractions

- Dominoes and bingos

- Strips of paper to compare decimals

Playful manipulative materials

Games 8-12 years

- Mirrors for the relationship between operations
- Rulers to work on the distributive property with respect to addition
- Cards of equivalent fractions
- Numerical rules for fractions, to find the divisors of anumber,...

- Geometric figures

- Polycubes and fractions

- Bingos for the relationship between fractions and decimals
- Freudenthal fraction table for the 1st operations with fractions
- Dominoes of fractions, decimals and percentages

6. Self-instruction training

Self-instruction training

ÿ Read the problem as many times as necessary to

understand it.

ÿ Reflect, think: What do I have to look for? What are they
 asking of me?

ÿ Underline the relevant data in parts

ÿ Draw or write this data prominently

ÿ Find the operation that should be used to find the solution.

ÿ Interpret the data with the corresponding operation

ÿ Do the operation and review each step. Look back

ÿ If necessary, use acalculator operation , or tables to ensure that the
is well performed

ÿ Write the solution clearly and well written

Thank you for your attentiont