

ABSTRACT:

The Bachelor's thesis deals with the connection between pre-math literacy and art education in kindergarten. The paper refers to similar activities suitable for primary school, but the scenarios and their implementation in practice fully respect the specifics of preschool age. Both the methods and the material are adapted to this, as is the language. Activities linking pre-math literacy and visual arts are embedded in a specific didactic structure.

The thesis has three main parts. The theoretical part deals with the areas on which the practical part is based: motor and cognitive development of the preschool child, a brief biography of the artist Zdeněk Sýkora, and pre-math literacy. The methodology part defines the aims, tasks and methods of the Bachelor's thesis, and is based on action research with elements of qualitative research. The practical part includes scenarios and description of their implementation, records of the observed phenomena and their analysis based on direct observation, video recording and reflection with post-reflection. Children aged 5 years and 7 months to 6 years and 7 months were observed in a kindergarten setting. On the basis of the partial conclusions, minor modifications in the scenario are proposed, which are complemented by didactic recommendations for the possible use of the described activities.

The activities are based on two works of art by Zdeněk Sýkora which, from the point of view of pre-mathematical literacy, include: surface coverage, colour transformations, perception of shapes and their proportions, the relationship between the whole and its parts, probability.

KEYWORDS:

Pre-mathematical literacy; Disciplinary overlap; Math and visual arts; Manipulative activities; Surface coverage; Colour transformations; Perception of shapes and their proportions; The relationship between the whole and its parts; Probability