Paper ID: 80226
student

IAF SPACE EDUCATION AND OUTREACH SYMPOSIUM (E1)
Ignition - Primary Space Education (1)

Author: Ms. Sri Venkata Vathsala Musunuri
Polytechnique Montreal, Canada

HOW COGNITIVE FUNCTIONS PLAY A VITAL ROLE AMONG CHILDREN, CONSEQUENTLY AIDING CATALYSIS IN ORDER TO IMPLEMENT, AND EXECUTE SPACE EDUCATION AT THE PRIMARY SCHOOL LEVEL CURRICULUM

Abstract

Why are cartoons and animations famous among the 5–11-year-olds? Their brain connects with colors and bright things faster with ease, it helps them grasp the situation subconsciously better and this is linked to an example of visual- spatial cognitive function according to research. The innovation of this idea stems from a space games session conducted at the 72nd International Astronautical Congress (IAC) Dubai. This paper presents 1) how cognitive development is linked to brain development and how it plays a key role and can help children develop interest towards certain things with solid supportive research and how this will help us in inculcating knowledge of space. 2) Subsequently, considering the groundwork and implementing various examples of cognitive functions in the curriculum like, visual and spatial, memory, attention span, executive functions, hands on activities, thinking and reasoning that are themed space. 3) In addition to, new teaching methods that consider cognitive development of young children,that would help in sparking a passion for space at a very young age and possibly sustain specially for children in rural areas, given their ambitious and resilient nature. 4) To conclude, test the feasibility, validate, and execute this idea on a large scale, a real time case study and data from a school in the rural south of India will be critically analyzed in this paper presenting all the detailed methods and approaches used. This analysis will help us be cognizant of the idea put forward in long term. Specially in developing countries like India and in rural areas, when executed rightly we are anticipated to see enormous amounts of growth as, 10 – 15 years up the lane, the current primary school students hold impeccable power to transform the space industry.