

CONNECT

Inclusive open schooling
with engaging and
future-oriented science



BEST PRACTICES

Study of the great inventions in the renaissance. Analysis of the architectural works of the Renaissance. Leonardo Da Vinci's project - the city of the future created from the epidemic of the black plague. Identify problematic situations in urban spaces due to COVID-19.

ABOUT THE PARTNER	
ORGANISATION	PUCPR APC
COUNTRY	BRAZIL
INTERVIEWER	Patrícia Lupion Torres
DATE	04/02/2022
ABOUT THE TEACHER(S) INTERVIEWEES	
SCHOOL	School of Basic Education Professor Adelina Régis.
TEACHERS Names (for best practices certificates)	Sueli Perazzoli Trindade
GENDER	Female
DISCIPLINE (Science, Physic, Chemistry, Biology, ...)	Art and Science.
How many lessons were used in open schooling?	
Title of the open schooling resource used	RESIGNIFYING ARCHITECTURE AND URBANISM SPACES IN COVID-19 TIMES.
Type of science-actions (structured or open scenario)	Open scenario
Curriculum topics	Quality of life, health, prevention, art and science, language and communication. Architecture and urbanism, COVID_19, great Renaissance inventions, model making.
ABOUT THE TEACHERS' STUDENTS	
Grade	2nd grade of high school.
Average age	14 to 16 years
Total of students' participants	104 students
Total of students' who completed science actions	78 students
SCIENTISTS INVOLVED:	
Name	
Field	





QUESTIONNAIRE

01. How did you (teachers) use open schooling resources? Could you please describe what did you do in your lessons?

Activities of Students with scientists:

Activities of Students with families:

With the defined objectives, observation, analysis and study actions were carried out on the problem with the creation of models with futuristic ideas. Observation of city spaces identifying the problems that arose with the pandemic. With the problem and objective defined, the process of building the model begins, based on the idea of re-signifying the spaces of architecture and urbanism in times of covid-19.

02. How did your students used CONNECT resources? Do you have (or could describe) any samples of best science actions (for our website / reward)?

Any example of what students prepared?

Research on art and science and the great inventions in the renaissance.

Reading of the 15th century Epidemic, which inspired Leonardo Da Vinci to create the “city of the future” project.

Presentation of videos and websites on the subject of COVID-19

Observation of urban spaces and their architecture, and identification of problems found in houses, buildings, hospitals, public transport, parks, squares, schools, gyms, which DO NOT offer quality of life and protection against COVID-19.

Construction of a model and presentation of the problem with a possible solution to the identified problem.

Ex: the PROBLEM is in the care of recovery of contaminated patients. How could a new hospital, or park with cozy, welcoming spaces, offer a joyful and harmonious environment with therapeutic medicine to overcome fear, panic, anguish, physical and emotional difficulties?

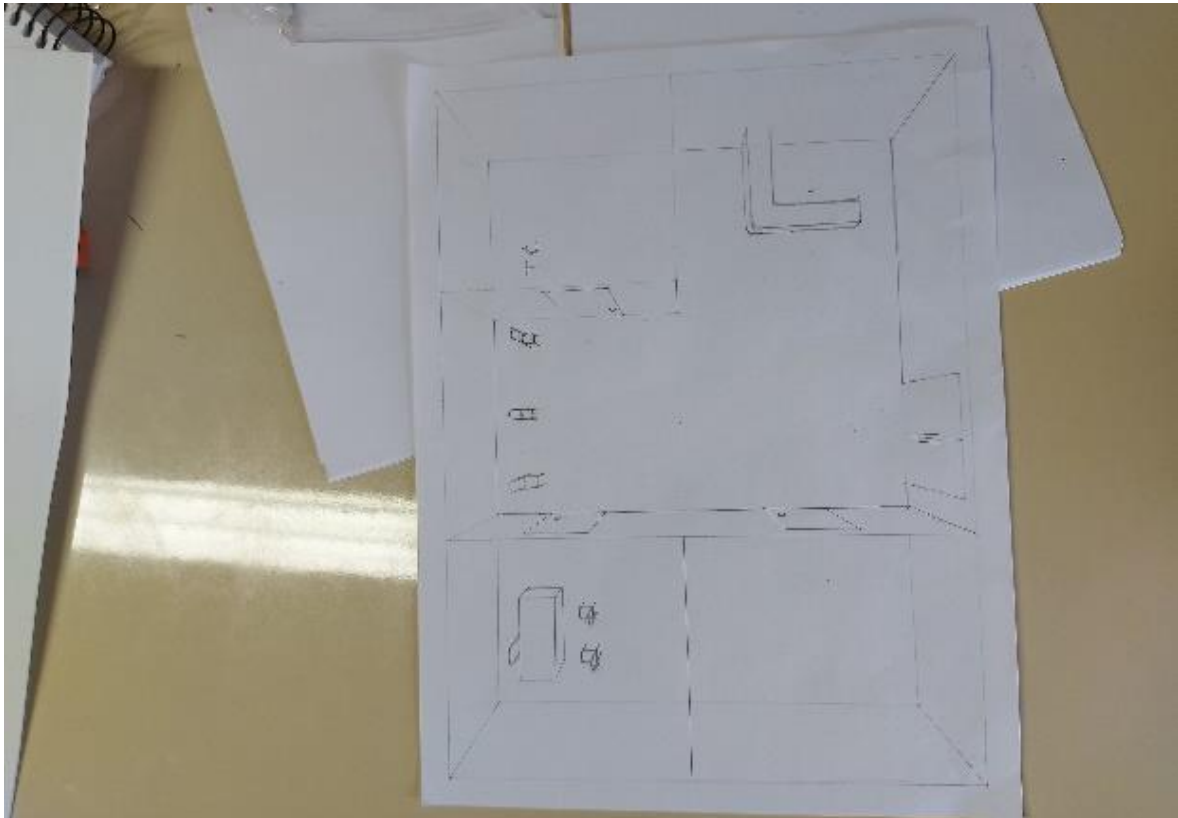
Ex: the PROBLEM is in public transport. What is the solution to improve public transport, since the distance of the seats does not correspond to the distance of 1.00 meters?





Ex: the PROBLEM is in the size of the internal spaces of the house, thinking about work "home office". What is the innovation of house and apartment projects to meet this new type of work that COVID-19 has caused overnight changes along with digital technology, internet?

Slide? Poster? Video clip?
(Add an image if it is possible)

















03. How well did science-action resources meet your needs?

...

Needs for example related to school curriculum:

The adaptations took place in accordance with the theories and learning practices of the New High School. In general, it fits perfectly into the school curriculum by exploring and complementing actions already developed and based on competences and skills in teaching by areas of knowledge.

Students' engagement:

The participation of students was significant in carrying out the activities. It was evidenced that the dialogue between the areas of knowledge was relevant for the engagement, interaction and production of scientific knowledge. Students felt protagonists in the learning processes. There have been changes in attitudes and habits regarding care in the prevention of COVID-19 in school, family and society spaces. Bearing in mind that it is not always possible to achieve the participation of all, however, it is observed that the number of students who were not included in the learning process is minimal.

Students' interest and confidence in science:

During the making of the model, it was visible that the students embraced the proposal, as they were confident in their ability to think, create and produce. The freedom of creation in the model aroused more interest in the students, because they felt they were subjects in the process. Trust





asserts itself when actors identify themselves as protagonists with autonomy in responsible decisions.

04. How easy or difficult were science-action resources to use?

...

Any specific issues related to materials, procedures, interaction curriculum pressure:

As the school offers teaching by areas of knowledge, it facilitated the planning of actions and the applicability of learning activities. Teachers meet weekly, and seek theories and practices compatible with the subject addressed, technological resources that expand the possibilities of access to science.

05. What were the benefits of science-actions for your students?

Describe the students' outcomes in their science-actions related to:

KNOWLEDGE	Curriculum knowledge was worked on, in an interdisciplinary and transdisciplinary way, emphasizing the analysis of historical and scientific data in the disciplines of art and science. What made possible, in a practical way, the interaction and the protagonism of the students in the learning process.
SKILLS	They were developed through individual and collective practices contemplating the analysis and experiences that addressed the artistic and cultural heritage monuments contextualized with COVID-19. The result shows the students' perceptions when speaking with property about the coronavirus and the attitudes and habits to combat contamination in school, family and society.
ATTITUDE	Enhancement of urban spaces. Create new ideas to solve problem situations in architecture and urbanism.





Identify preventive measures against COVID-19 in urban spaces.

Ressignifying the school curriculum with theories and practices in times of COVID-19.

To value the knowledge built in the school environment for life in society.

Promote scientific reflections at school, family and community on innovations

06. What were the challenges of using science-actions for your students?

Main challenges faced by students (Please, select all that apply):

- Difficult
- Long
- Boring
- Not prepared
- Not feeling capable to...
- Not able to complete the science-action
- Not enough time
- Other (Please, specify): The pandemic was a limiting factor in the process

07. Which activities worked well with the curriculum?

All the activities. The fact that it was adaptable helped a lot.

What helped kids to meet the learning objectives:

The New High School modality that is being implemented in Btasil has made possible several innovations in the school curriculum and in the form of planning that allows teachers to meet by areas of knowledge. The insertion of technologies for real-time access to local, regional and global information.





08. Which activities did not work well with the curriculum?

None.

Anything that could be done differently or avoided:

Social distancing in the pandemic caused a lot of disruption in the school routine, many changes that made contact with scientists impossible. The return of face-to-face classes with 50% of the students reduced the time for carrying out the learning activities. The meeting with the specialist did not take place in person.

