


CREATION IN THE LIGHT OF GOD'S CO-CREATION <https://doi.org/10.56238/sevened2024.041-010>

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ABSTRACT

This article reports a co-design experience developed as part of the integrated discipline "Open, Hybrid and Networked Education", of the Education: Curriculum program at PUC-SP, in the first semester of 2023. The Maker approach was applied in the context of religious education for children at the Água Branca Baptist Church (IBAB). Based on the concepts of the Maker approach and the pedagogical guidelines of IBAB Criança, the researchers proposed training with the project's volunteers, who then carried out an experience with the children. It was understood that this experience was transformative for all involved, and may be part of the IBAB Child curriculum in the coming semesters.

Keywords: Maker. Religious education. Co-design.

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INTRODUCTION: CONTEXT

This article presents an account of a project developed in co-design at the Baptist Church of Água Branca (IBAB), a religious institution founded in 1937. IBAB is currently located on a plot of land in the Barra Funda neighborhood, in São Paulo, where it was installed just over ten years ago.

The Baptist Church is a movement of evangelical Christianity, heir to the beliefs and values of the Protestant Reformation, and has its origins and roots of faith and practice in the movement of English Baptists since the sixteenth century.

The way of life of Baptists is guided by some principles, such as: belief in the Bible as a rule of faith and conduct; the Church as a local, democratic and autonomous community; freedom of conscience, individual responsibility before God, and separation of Church and State.

IBAB Criança is one of the ministries of the Água Branca Baptist Church, whose mission is to promote creative, contextualized and participatory biblical teaching. To this end, it promotes activities based on biblical texts for children from 0 to 13 years old, which take place at times concomitant with the services attended by parents and family members. These activities are differentiated by age group, being: the nursery from 0 to 12 months, playful activities based on play for children from 1 to 4 years old, and actions and projects with experiences in small groups for children from 5 to 13 years old, sometimes divided into a group from 5 to 8 years old and another from 9 to 13 years old. The volunteers are all identified with yellow t-shirts with the IBAB Child logo and the children receive tags as soon as they arrive so that they can be more easily identified, in addition to the tags being a security element when delivering them to their parents at the end of the activities. In addition to the projects carried out simultaneously with the services, the children also participate in camps and experiential activities.

IBAB Criança has an exclusive space in the church structure, reserved for its activities, and this space surprises by the size and quality of the structure. They are study rooms with air conditioning, and among them there is a room fully equipped with children's toys where nursery activities take place, an auditorium for theatrical plays with aisle space and dressing room, a warehouse to store costumes and various materials and an auditorium with acoustic insulation and musical instruments where praise activities are carried out. The environment is all decorated in a playful way, with the walls painted in cheerful colors and rounded windows.

The structure of the meetings that take place on Sundays is usually composed of a first moment of presentation of the text of the week, whether in the format of a play, music,



dance, exhibitions, among others. Participants are then divided into small groups of 10 or 15 children to discuss the text, and often produce a drawing or art based on what they have learned.

These moments are conducted by volunteers, people with some kind of contact with the church - most of whom share their faith and have been attending services for a few years. These volunteers are trained and guided by a group of coordinators who also plan the activities and texts that will be discussed each week.

CONCEPTS

MAKER

According to Soster (2018), Hatch was inspired by the concepts of Dougherty and Anderson to develop the Maker Manifesto, taking into account some principles that the authors consider important to disseminate to society, which are: "(...) doing, sharing, giving, learning, accessing tools, playing, participating, supporting and changing (...)" (SOSTER, 2018, p.50).

In this sense, we can observe great movements that have emerged since the Maker Manifesto, which are: FabLabs, the Maker Magazine, and fairs such as Maker Faire. Just as we can observe in Brazil a growing creation of spaces for Maker creativity in private and public schools, in order to make learning more "active" for students. As Soster (2018, p.52) puts it:

Halverson and Sheridan (2014) believe that the great promise of the Maker Movement in education is to "democratize access to the discourses of the powerful that accompany the production of artifacts, especially artifacts that use 21st century technologies". Blikstein and Worsley (2016) understand that we are experiencing a rare opportunity, in which we have greater access to technological tools, well-established progressive ideas and research, and student-centered pedagogies making sense to society. (SOSTER, 2018, p.52)

From these points, the Maker approach, within educational spaces, can bring several benefits, namely: collaborative learning, the development of curiosity - that is, it awakens in the student the desire to learn and delve deeper into the content -, provides open and dynamic environments, where children can move freely using the materials and tools available, learning from mistakes in which they are allowed to make mistakes and review their learning, learning interdisciplinarily - connecting different disciplines, showing the uniqueness between knowledge - and producing artifacts that enable the development of new skills.

Therefore, the Maker approach provides the interconnection of various contents, both inside and outside the school, in addition to making learning meaningful for students,



placing them at the center, as participatory and active beings in their contexts, using space and tools to resignify teaching.

Through this ease of interlocution between knowledge, Maker becomes an easy-to-apply approach in various learning contexts. Thus, transforming the learning of each context in an active and meaningful way, making visible what the student has learned.

IBAB CRIANÇA PEDAGOGICAL GUIDELINES

The mission of IBAB Criança is to promote the discipleship (teaching and learning) of children, based on their network of personal relationships and on creative, contextualized and participatory biblical teaching.

It is understood that teaching is a two-way street, where those who learn teach and those who teach, suddenly, learn.² Therefore, it is believed that the pedagogical proposal expressed should not be rigid, on the contrary, it should be open to revisions, following the analysis of the historical context, social and cultural movements – present in the community and in the world – always in line with the biblical narrative taught for the promotion of life.

Teaching is child-centered, based on the biblical narrative of Jesus, who places children at the center and as a priority of his love, in an adult-centric society.

At that moment the disciples came to Jesus and asked, "Who is the greatest in the kingdom of heaven?" Calling a little child, he placed him in the midst of them, and said: "Truly I tell you, unless you turn and become like little children, you will never enter the kingdom of heaven (HOLY BIBLE, Matthew 18.1-3).

From this statement, it was understood that for teaching to be effective and achieve its objectives, it is necessary to know the child, observe the rhythm of child development and offer meaningful activities in the form of experiences, so that he can experience what he learns. Thus, it becomes essential to recognize play as the child's universal language.

In IBAB Criança, the biblical content offered is previously selected, on a gradual scale and following a learning spiral, recognizing what the child is able to learn, according to his or her stage of development, understanding advances and setbacks as functional parts of learning.

The curricular action promotes biblical and theological teaching based on faith as life, integrating the cognitive and affective spheres. And the biblical narratives are selected based on their relevance to the child and their specificities.

² FREIRE, Paulo. Pedagogy of Autonomy: necessary knowledge for educational practice. 25 ed. São Paulo: Paz e Terra, p. 13, 1996.



The three levels of the curriculum (formal, hidden and real) proposed by Libâneo (2001, p. 99-100) are considered and it is understood that the real curriculum requires the consideration of culture and life situations for the elaboration of the teaching proposal.

Which means that there is no thought outside culture, man only happens through culture and in culture (MORIN, 2010). For this to happen, it is important to value society and the various forms of artistic expressions, organizing the curriculum based on an integrated education system. Human beings, as well as society, are multidimensional, both are complex units and are linked to each other.

In this way, the curriculum presents the contents from a globalizing approach, reaching all dimensions of the person – biopsychosocial-spiritual – who must access the different dimensions of society, actively participating in its transformation process. Pedagogical action from this approach contributes to broadening the very notion of learning content, which includes not only factual and conceptual content ("What should we know?"), but also procedural ("What are we going to do?") and attitudinal ("How should we be?") content.

The structure was built to meet the ages of children from 0 to 13 years old with a support network of family and volunteers. At these ages, they are offered the experience of:

Musicalization: An experience of musicalization, art and body expressions is promoted, based on scripts prepared with guidelines and alignment of the coordination of IBAB Criança, involving children;

Large group: Environment in which they listen to the biblical story in a creative and contextualized way through creative communicators – theater, storytelling, exhibition, etc.;

Small group: Space for mutual care and strengthening of bonds of friendship for children, enhanced by a facilitator leader who stays with an approximate number of ten children. The small group leader has the function of developing relationships between children through the affective bond he establishes with them. He talks to the children, helping them to attribute meaning to teaching, being open primarily to listening and more elaborate interventions (activities). It is here in the small group experience that we have the power of the child's protagonism, including proposing practical and concrete solutions that are the result of the conversation of the biblical narrative.

In the small group, the facilitator leader has the role of receiving the children in an affectionate way and checking with the family if there is any specific guidance for the child (food/belongings), as well as facilitating the interaction of the children at different moments of the routine and taking care of the child's safety, which is important and central.



MAKER AND THE IBAB CRIANÇA

IBAB Criança, as a project of a Protestant Baptist religious community, built from the valorization of the biblical text as a guiding instrument of its praxis, seeks in this text subsidy for its action in the world. In this sense, one of the values present in the biblical text or narrative is the belief or myth of the creation of humanity in the image and likeness of God to be a co-creative agent of God in the created world.

Then God said, "Let us make man in our image, after our likeness. Let him have dominion over the fish of the sea, over the birds of the air, over the great beasts of all the earth, and over all the small beasts that move along the ground."
God created man in his own image, in the image of God he created him; male and female he created them (Genesis 1:26,27).

The Lord God placed man in the garden of Eden to care for it and cultivate it (Genesis 2:15).

These texts understand the creation of the human being and also demonstrate what is expected of these creatures made in the image and likeness of their creator. Considering the account in the following chapter of Genesis 2:15, the words "care" and "cultivate" help in understanding the responsibility of the human being over God's good creation. The Garden is this "world in which God has placed us to cultivate it" (ROJAS, 2019, p. 7). And, it is from this idea of cultivating the Garden that the concept of culture arises; Everything that human beings cultivate (or transform) through their work and their actions in the world becomes culture.

Such responsibility presupposes the active participation of human beings in the cultural development of the world. Next, the biblical account explains what must have been Adam's first task:

And when the Lord God had formed out of the ground all the beasts of the field, and all the birds of the air, he brought them to man, to see what he would call them; and the name that man gave to each living being, that would be his name. Thus man gave names to all the domestic flocks, to the birds of the air, and to all the wild beasts (Genesis 2:1-20a).

From these narratives, IBAB Criança understands that God calls the human being as a cooperator in the task of putting order in his Creation, thus having the understanding that human beings are producers, creators and builders of the world in which they live. It is a cultural transformation that asks human beings to participate in the creation of culture, not just its consumption. It is in this act of creating that the coordinators of IBAB Criança understand that dialogue and the instrumentalization of tools that enhance the child's protagonism in the co-creation process are necessary. Therefore, the Maker approach, by offering rewarding and meaningful learning, a collaborative community, a renewed sense of

what it means to be human and a vocation to change the world, proves to be adequate as one of the contributions to religious praxis with children.

INTERVENTION

VISIT TO THE CONTEXT

After an initial conversation with the coordinators of IBAB Criança to align the objectives, deadlines and stages of the project, the researchers visited the church and IBAB Criança on March 16, 2023. During this visit, it was possible to better understand the structure and history of the church, in addition to meeting the volunteers involved with the project.

The researchers were received in a very welcoming way during this visit, having been invited to have breakfast with the volunteers and even asked about the size of their T-shirts, to receive a yellow T-shirt in the future. On the day of the visit, the text studied by the children from 8 to 13 years old was that of Creation, so a theater was presented with the story of Adam and Eve, focusing on the creation of Paradise and the responsibility that Adam and Eve had to take care of that space that was given to them by God. The theater featured amazing technological elements like neon lights and black lights, which certainly contributed to capturing attention and engaging children.

WORKSHOP WITH VOLUNTEERS

Together with those responsible for the project, it was decided that, at first, it would be important to bring together the facilitators who would carry out the facilitation on the day planned for the experience with the children (May 21, 2023) for a training focused on the concepts of the Maker approach. The researchers decided to include a moment of practice in this training, understanding that the Maker approach, by its nature, is more easily understood through practice. In addition, it was understood that, after going through an experience, the facilitators would probably feel safer to apply this same experience with the students. Despite the intention to carry out the training in person, to better apply the experience, the project coordinator pointed out that due to the work schedule and studies of the facilitators, it would be better to apply the training online, on a weekday, at night.

On May 10, 2023 at 8 pm, the researchers and the project coordinator, José Malua, met in a video call held on the Zoom platform. After a quick initial moment to line up the speech, the volunteers were included in the call. Seven facilitators participated in this moment, all allocated to the Sunday class of IBAB Criança.

Chart 1 - Profile of the facilitators

Order of presentation	Facilitator	Area in which he works	Design time
01	F1	Nursing	10 years
02	F2	Chart Market	10 years
03	F3	Information Technology	3 years
04	F4	Publishing	6 years
05	F5	Nutrition	1 year
06	F6	Performing Arts	1 year
07	F7	Chemical industry	8 years

Source: prepared by the authors, 2023.

In the first 30 minutes of this workshop there was a presentation by all those present. The researchers told about their background, their relationship with Maker teaching and explained the objectives of the project, and the facilitators briefly shared their reasons for participating in IBAB Criança. They highlighted how passionate the work with children is, having declared that the most recurring feelings after the activities on Sundays are of renewal and learning.

Next, the coordinator of IBAB Criança conducted a brief contextualization of the reasons why he was bringing a pilot project of Maker teaching to the Sunday activities of teaching the word. This moment was designed to increase the volunteers' engagement with the process, since their connection with IBAB occurs through their religious beliefs. Following the ideologies of the Baptist Church, he highlighted the premise that the "whole Gospel is for the whole child", that is, that the child must be understood in a complete way, not only in its spiritual dimension but also emotionally, physically and psychically. To reinforce the importance of the project, he highlighted that theology and biblical-theological narratives need an approach based on pedagogy to be applied in practice, putting children into action.

To close his speech, José Malua also highlighted that this project is a pilot, and that the co-creation proposal provides for the facilitators to participate in the construction, so that they should feel free to contribute and ask questions whenever they feel the need.

After the moment of presentation of the proposal, the presentation of the historical context of the Maker began, a brief presentation of approximately 20 minutes just to situate the facilitators regarding the theoretical basis of the approach. Then began the moment of hands-on experience. The proposal was an experience that reflected the practice that educators would have with children. Thus, in addition to the learning that facilitators would have from having contact with the Maker approach itself, it would also be a useful moment to test the text of Noah's Ark as a trigger for learning. The text, which corresponds to chapter 6, verse 9 of Genesis, was sent in advance to the volunteers so that they could do a previous reading and read together in the training.



When faced with the challenge, the volunteers initially had difficulty in concretizing elements of the text or an interpretation that corresponded to them in any physical artifact. One of the volunteers even said: "I'm having difficulty creating something, I only have post-it, scissors, glue... and that's it! I don't know what I can create with these materials.", the researchers then gave a suggestion, "With these materials you can create a tree, for example: taking the post-it note with the sticky side you can stick it together forming a cylinder and then you can take a pair of scissors and cut several threads to make the branches of the tree. The tree can have several meanings for each one in a different way, it can mean: welcome, cool shade, a conversation, a hug, food, and other meanings." After this report, the volunteer managed to create an artifact inspired by the idea of the tree. Other volunteers created boats, or searched for objects they had already built at other times, in order to connect with the theme that was being proposed.

Therefore, as much as some volunteers had difficulties in creating initially, with the moments of conversation about the theme and the possibilities presented, the volunteers felt safe to make an artifact that made sense with the story and for them. This moment of creative insight is important in the Maker approach, because it brings different ideas to the construction of the artifacts.

PLANNING OF THE EXPERIENCE

Based on the learning and the return of the training carried out with the facilitators, the researchers together with Malua set up a plan for the experiential moment with the students. In the planning, the materials to be made available by a group of students were planned, in addition to questions for deepening and reflection on the text. As part of the learnings acquired during the training, it was decided to reduce the number of questions and focus on the topic of sustainability, so as to make the discussion faster and avoid a wide spectrum of topics that could cause confusion to the students.

This planning was the basis for the creation of the script which, as is already common practice at IBAB Criança, was sent in advance for the facilitators to prepare for the moment with the children. The script has four pages and begins with a page of contextualization of the Bible studies carried out throughout the year. It then indicates which biblical text will support the discussion of that specific Sunday (in our case, "Noah: the faith that builds to preserve life" - Genesis 6 - 9: 1 - 20). He also details the learning objective that will be developed from the text, and it is interesting to note that the objective is written in simple and direct language, without the far-fetched words that usually make up biblical

texts: "Understand that a righteous man can help God when things in the world are not very good."

From the objective, the script continues with another page of text that details the focus that should be worked with the children from the verses read, and then highlights the questions that should be directed to the children, already adjusted from the comments raised by the researchers: "What caught your attention most in this story? What do you imagine to be the injustices and evils in society at the time Noah lived? And today? What are the injustices and evils that you observe in society and on the planet? How are people taking care of the planet today? What do you think we can build to improve these situations that have been talked about?"

Next, the script describes the experiential moment, including images illustrating the "routine" of the Maker work, such as ideation, prototyping and presentation. These images came from previous experiences of carrying out a Maker experience in a traditional classroom environment and were important as a visual aid to the script since these concepts are not so simple to describe and are not part of the daily life of the facilitators. The researchers understood that it was important to highlight that the students should create something physical with the available materials, so that this alert appears twice throughout the script, both before and after the description of the experience, the second time with an extra highlight in the yellow text.

Finally, the script ends with a description of the materials that will be available and a simplified schedule of the moment with the students, so that the facilitators have easy access on the day of the experience and can manage the time properly.

EXPERIENCE

The experience with the children took place on Sunday, May 21st, 2023. This date was chosen mainly because it was after the Sunday of Mother's Day, in which many activities were already planned, and right before a Sunday in which the children would go to a camp.

Following the common planning of IBAB Sundays, the facilitators who would carry out the experience with the children of the 9:00 am group arrived around 8:30 am, met in one of the rooms and held a quick meeting for the final alignments. The researchers set up a table in this room with all the materials that would be available for the moment of experience, which allowed them to have prior contact with the material.

After organizing the rooms in which the group activities would take place, the facilitators picked up the children and divided them into 5 rooms. As soon as they settled

into a circle, the facilitators asked how the week and Saturday went, in order to relax and break the ice before the start of the activity. At that moment the children saw the materials on the tables and asked: "Are we going to use these materials?", "Are we going to build something?". The facilitators made a suspense and asked them to take the bible to start the reading that told the story of Noah's Ark. Next, the facilitators started the questions, indicated in the lesson plan, about the text and then went on to the creation.

Throughout the activity, the groups progressed at different paces and processes. Even after realizing that some would not have time to reach the last stage and share the productions, the researchers avoided getting involved, letting each facilitator dictate the pace of their room. Two rooms skipped the prototyping stage, due to the time constraint and for extending the discussion stage. A third did the opposite and skipped the discussion stage, having only read the summary of the biblical passage, since the children were very anxious and asking to start the part of the project. One class was especially dispersed in the discussion stage, but the children engaged at the moment of getting their hands dirty.

Below we present some reports and observations of how the experience was for children of different profiles and in different groups:

One of the children was unable to produce an artifact. According to the report of the facilitator responsible for the group, the boy "kept changing his mind, started the project several times and couldn't finish it".

Another child started the project with the idea of assembling a boat, but encountered obstacles in the execution that prevented him from finishing as planned. With the facilitator's encouragement, she adapted the idea and ended up building a Santa Claus sleigh.

A third boy was not very engaged with the activity and initially produced a paper folding in the shape of a boat. However, as his colleagues in the group followed the production, he was inspired and produced wooden oars for his original boat.

Thinking about the practical operation of her artifact, a girl placed a support on the "seat" of her boat to give more comfort, as well as wood at the bottom so that the boat "can float".

A single group, the one in room 4, managed to finish the experience on the planned schedule and, therefore, had the moment of sharing and talking with the children. The children presented the meaning of the artifacts they built, which are recorded next to their respective prototypes in figure 1:

Figure 1 - Artifacts produced by the children in class 4



Source: captured by the authors, 2023.

As described by the very child who produced it, the artifact that is higher up in the figure represents a "house of peace", from whose chimney comes a smoke of love. Below him in the image is the "bow and arrow of friendship and love," which casts love into the world. To the right of the bow and arrow is the "empathy flower", which are intended for people who are nervous or who do "something bad": by smelling the flower, the person puts himself in the place of the other. Finally, further down in the picture is a machine that beeps when some racist attitude occurs, and from its interior "something falls to help stop" this attitude.

The children in this group also shared that they were impressed to see the materials brought, and that they had "no idea what was going to happen." They declared some difficulty in getting their hands dirty. Two girls, who worked in pairs, shared that in two people the activity is more difficult, but that they were able to complete it faster than if they had worked individually. Finally, a boy shared that he was scared to learn that he would have to produce something physical, and that after finishing the prototype he realized that to make an artifact identical to the drawing he would need materials that were not available, but he managed to adapt to make similar with the available materials.

CONCLUSION

In the implementation of this Maker approach in co-design, we were able to witness the power of collaboration and co-creation as tools for transforming context. Thus, throughout the evolution of the project, both volunteers and children realized that, by

experimenting and exercising their creative sides, they were also able to transform into something real what was previously only in the imagination. In this connection of knowledge, the approach enhanced the learning of the proposed theme ("Noah's Ark"), when it is observed that with ease or even difficulty the artifacts built by the children have elements of understanding the text, revealing what was previously hidden.

It is observed that the Maker approach can be inserted in several learning spaces, both formal, informal and non-formal, showing how flexible it is and can be part of different contexts. As proposed in this experience, it brought to IBAB Criança a moment of rich and dynamic learning, as it was possible to see in the testimony of facilitator F7: after the experience with the students, she pointed out that the Maker approach could be placed in the curriculum and that these moments should happen at least once a month. In this way, it is understood that the innovation brought has become institutional, having left the individual level and been taken to the collective level.

In a next experiment, the researchers understood that two modifications could be made aiming at an even more complete experience. First, each group of children could work on a specific guiding question, so that each one could delve into a different aspect of the biblical passage. At the end of the activity, the children could share their creations among groups, so that they could learn from each other and develop communication skills. In addition, it would be useful to include some kind of assessment tool that would help identify whether Maker allowed for more meaningful learning. One option would be the application of a questionnaire, but the presentation between groups itself can become evidence that the children understood the proposed questions critically. Their engagement in the activity and the excitement they show when showing the artifacts to their parents are also important indicators that can be used as an evaluation tool.

As the project progresses to the next steps, it becomes clear that implementing Maker experiences in co-design requires a flexible, open, and participatory context. The learnings acquired during this journey inspired everyone involved to continue exploring ways to promote creativity, collaboration and autonomy in children, thus enriching the process in a meaningful way.



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