

Technology and 3D printers, here is how San Giovanni will come down from the bell tower in Besano

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For more than 200 years the statue of San Giovanni stands out against the bell tower of the parish church in Besano, but a few people were able to see the face of the saint that watches over the town. Now, thanks to technology and the intervention of a citizen of Besano that always had place in his heart for his town, San Giovanni will “come down” from the bell tower and will, literally, go among his people.

The idea of making the statue available was born by the committee that was formed spontaneously to support **the renovations of the bell tower**, already at the final stage. Renovations that also led to clean and renovate the big statue of San Giovanni, created by the sculptor Gerolamo Argenti. A majestic statue (2,20m high) is beautiful, but difficult to reach once the scaffoldings would be taken off.

Gianmario Volpi, born in Besano and owner of Volpi studio in Carnago, followed carefully the renovation and offered **an innovative solution to overcome the distance between the citizen of Besano and their saint.**

“If the statue could not be materially removed from the top of the tower, it became necessary to make a perfect copy on a full scale,” explains Volpi. The first thing to do was to acquire a high-resolution 3D

image, which could then be used in a variety of applications”.

Having climbed the bell tower with a hand scanner, capable of detecting both the geometry and the colour of the object being analysed, Volpi and his collaborators literally “mapped” San Giovanni piece by piece, acquiring about 40,000 frames and millions of individual points, obtaining all the information needed to perfectly reproduce the statue.

Back at the Studio, it was a matter of ‘putting the pieces back together’ using dedicated 3D imaging software. A digital version of the statue was thus created, including a realistic reproduction of the surface. The grain and colour of the sandstone used by Argenti over two centuries ago are perfectly replicated, and every single sign of the artist’s chisel faithfully reconstructed.

To go from virtual reality to the real world, a **liquid resin 3D printer** was used to test the head of the statue. The head of the Saint, which was too big for the printer, was divided into segments and for each of the four elements were necessary about 20 hours to print. The result, once the pieces were reunited and after the work of an artisan restorer, was engrossing and therefore the project will go on, with the reproduction of the entire statue.

Studio Volpi has donated the mathematical models to the Municipality and work is proceeding with the realisation of the copy of the statue which, according to the intensions of the Municipal Administration and of the Parish, should be placed in the church, not before a tour to take it to various points in the town, in Valceresio and Varesotto.

“The idea is to make it **a sort of ambassador for the promotion of the territory**. Thanks to the generosity of Gianmarco Volpi and to his studies, the models are now property of the Besano community and therefore the statue of San Giovanni could be used in many ways. The Pro Loco in Besano has agreed to cover the costs of the copy, giving the project an incentive”, mayor **Leslie Mulas** explained.

This is an idea in line with Volpi’s point of view: “Today, having completed the first part of the mission, the Studio is looking to the future and is thinking about the definition of a **strategic roadmap for the promotion of tourism in Valceresio**. The proximity of Milan, Lugano and the great lakes are certainly elements in favour, in addition to the prestigious status of UNESCO heritage, as well as the variety of cultural and sports offerings. The good Saint, in his holographic or physical representations, can be a starting point, or an arrival point, of a real cultural, artistic and sporting adventure. Studio Volpi will now undertake to follow the evolution of the project, making its experience and skills in branding and communication available **to help the Saint take his first steps on social media**, thus becoming the focal point of a system of truly innovative territorial marketing, which puts the available resources online, with the participation of the various participants in a virtuous project between public, private and associations.”

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