

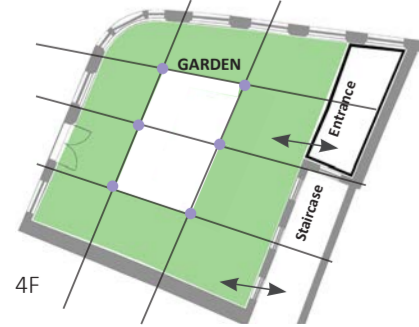
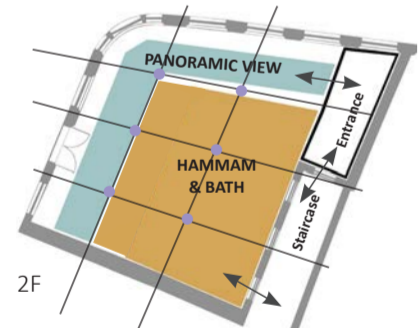
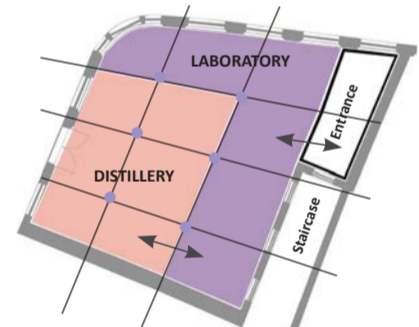
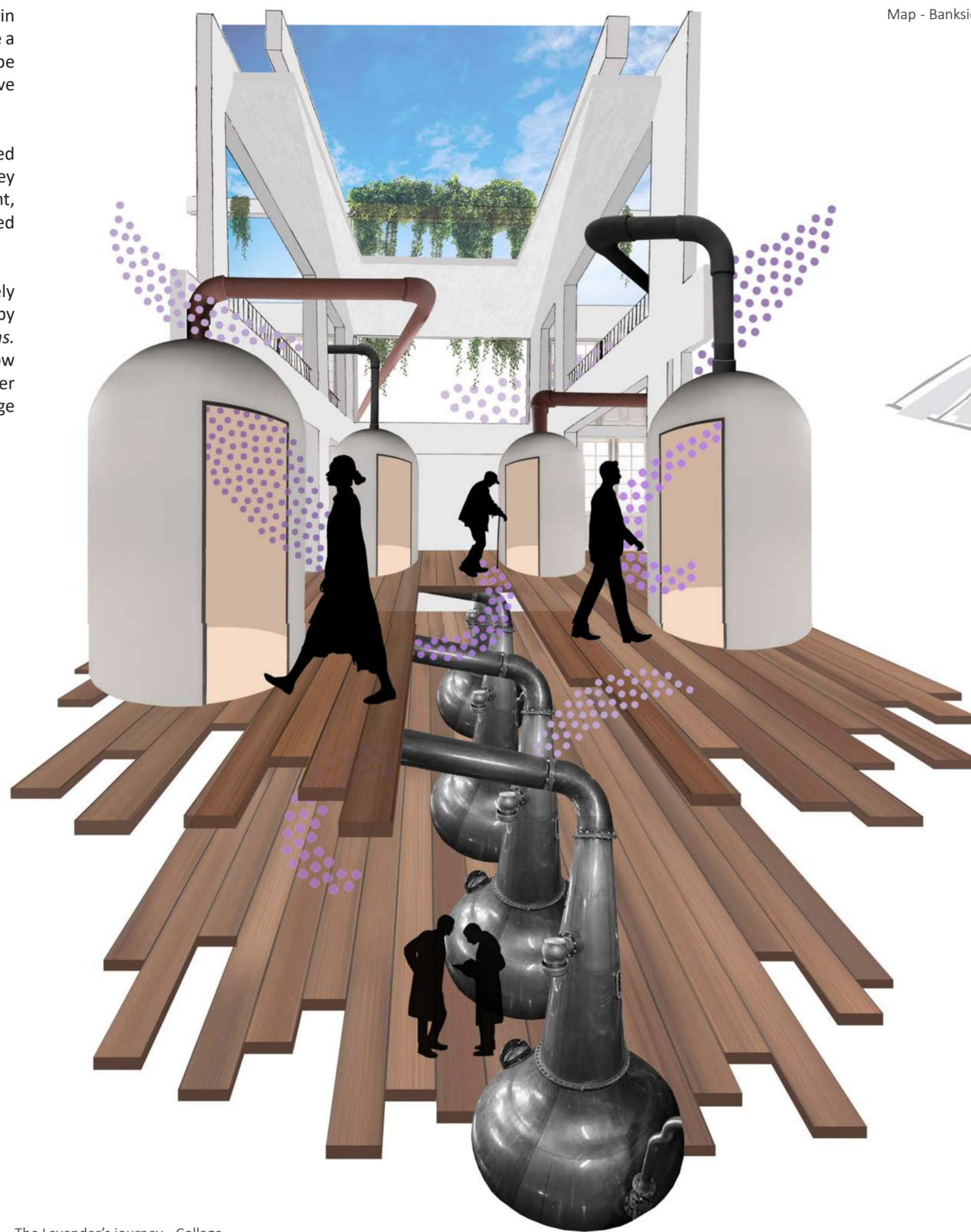
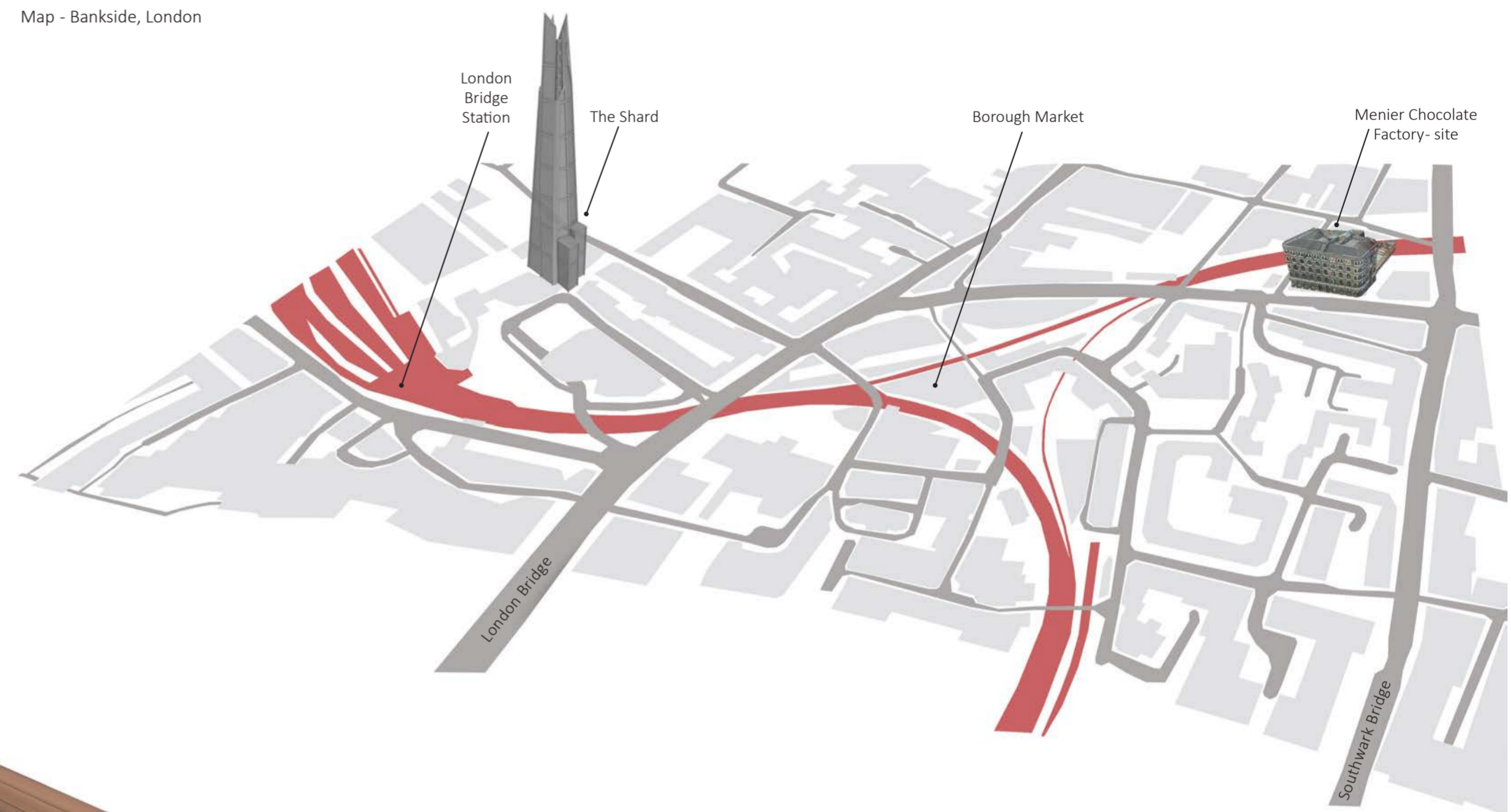
BREATHING CENTRE

The former Menier Chocolate Factory, located in Southwark in London, will be transformed into a well-being center, a place where people can escape the poor air quality of the city. Our goal is to improve people's health & breathing.

The center offers different hammams, shared steam rooms, inhaled with essential oils. They can provide respiratory disinfection, decongestant, and psychological benefits. Patients will be treated according to their needs.

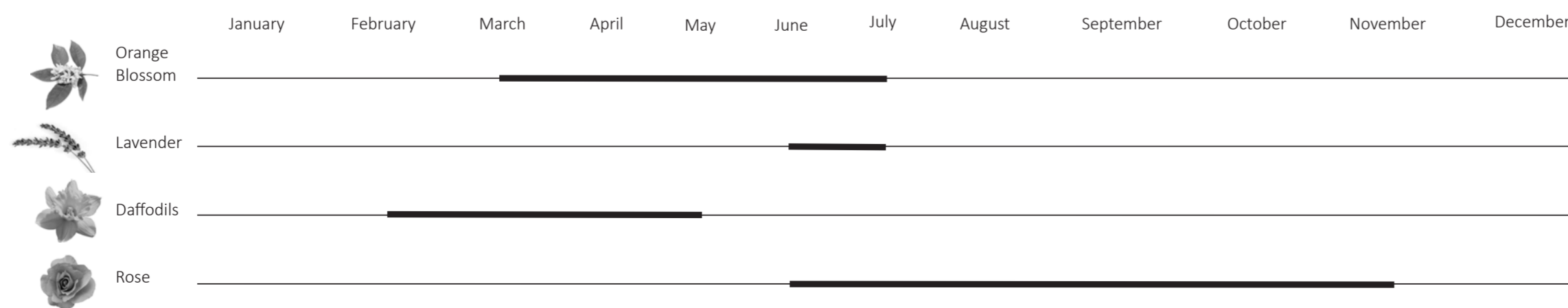
The process of making essential oils will be entirely home made in the distillery and careful use by professionals from the *Royal Academy of Physicians*. A garden will be added to the building to grow plants and flowers useful for the hammams. After their inhalation, our patients can enjoy a beverage in our Tea room.

Map - Bankside, London

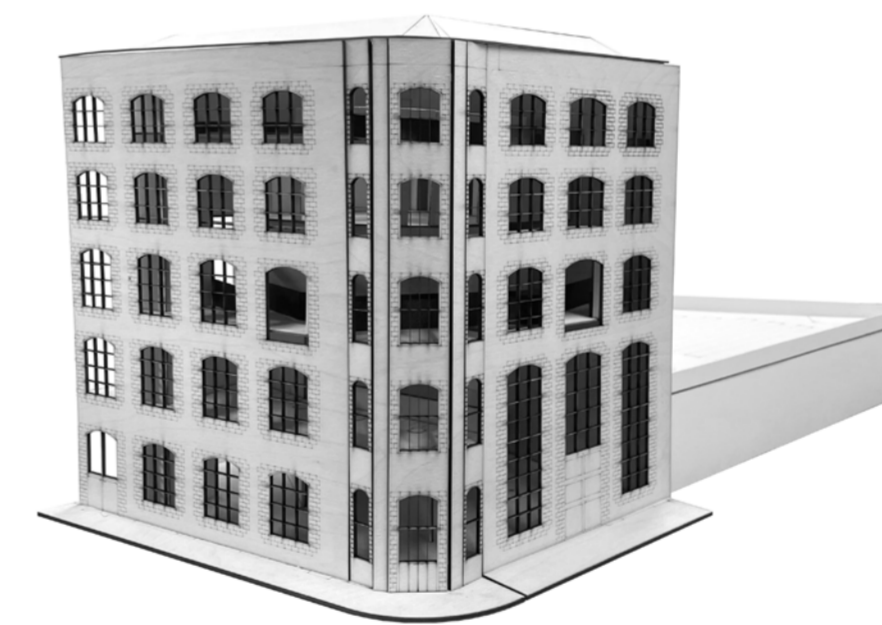


Planning diagram

The Lavender's journey - Collage



Harvesting seasons by flowers - diagram



Model Facade - 1:50



Site - Building's facade



Menier Room - GF



Menier Room - 1F

«The steam improves the sense of the body. Sweat increases the smell of the body, soften the skin and offering a profound physical experience.»

Ressano Garcia

HISTORY

Menier Chocolate Factory was create by a french contractor, Antoine Brutus Menier, who has a diploma in the composition of pharmaceuticals. With his knowledge, he used chocolate to hill people. The factory stayed in Menier's family until 1971 which was acquired by Rowntree Mackintosh Confectionery.

Knowing the chocolate was used as a medicine, I was interesting of what surrounding the building in 1870s. Bankside was the factory area. After unloaded the boats on the river Thames, the goods were distributed in the different buildings such as Anchor brewery or a vinegar distillery.



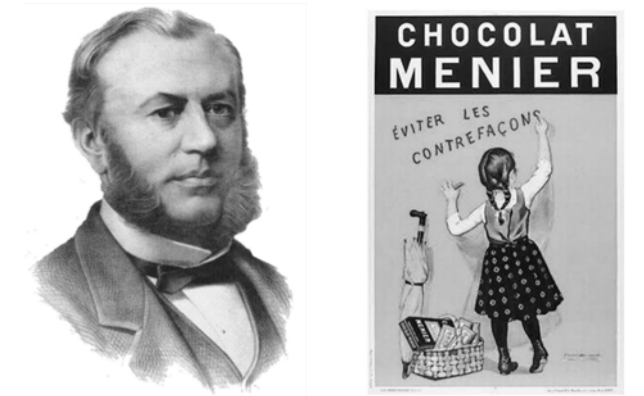
Map - Bankside in 1870s; an industry area



- Boiler works
- Anchor Brewery
- Vinegar Distillery

- Warehouse
- Hop Warehouse
- Ale Store

- Schools boys & girls
- Churches/ Chapels
- P.H



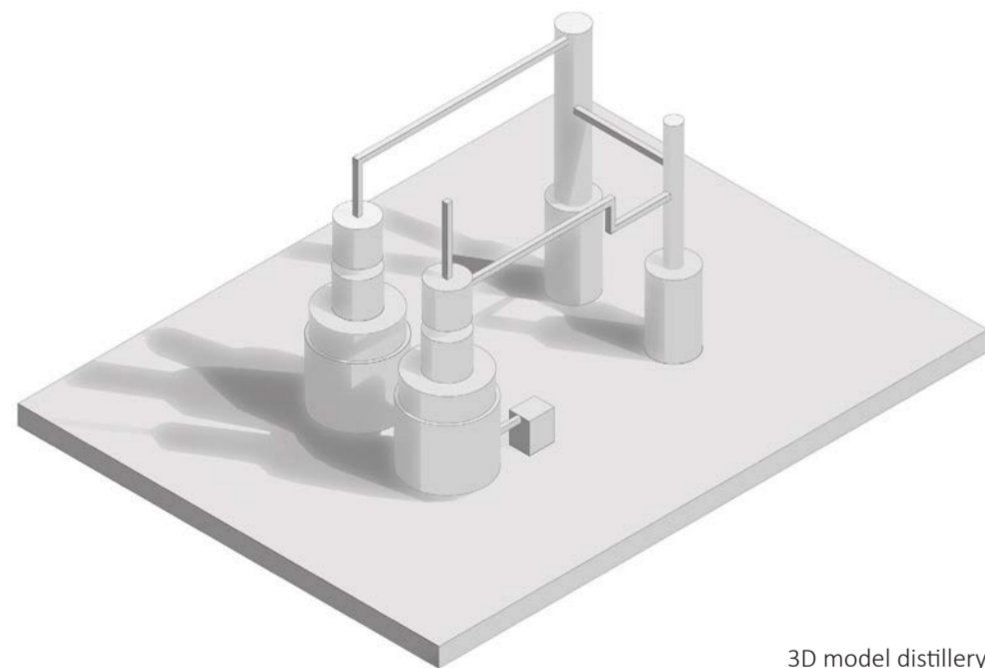
Antoine Brutus Menier

Advertisement



«Sale per day: 60 tons of chocolate.»

«Distilleries consumes up to 10-12 liters of water per hour and 37 liters to produce 1 liter of spirit.»



3D model distillery

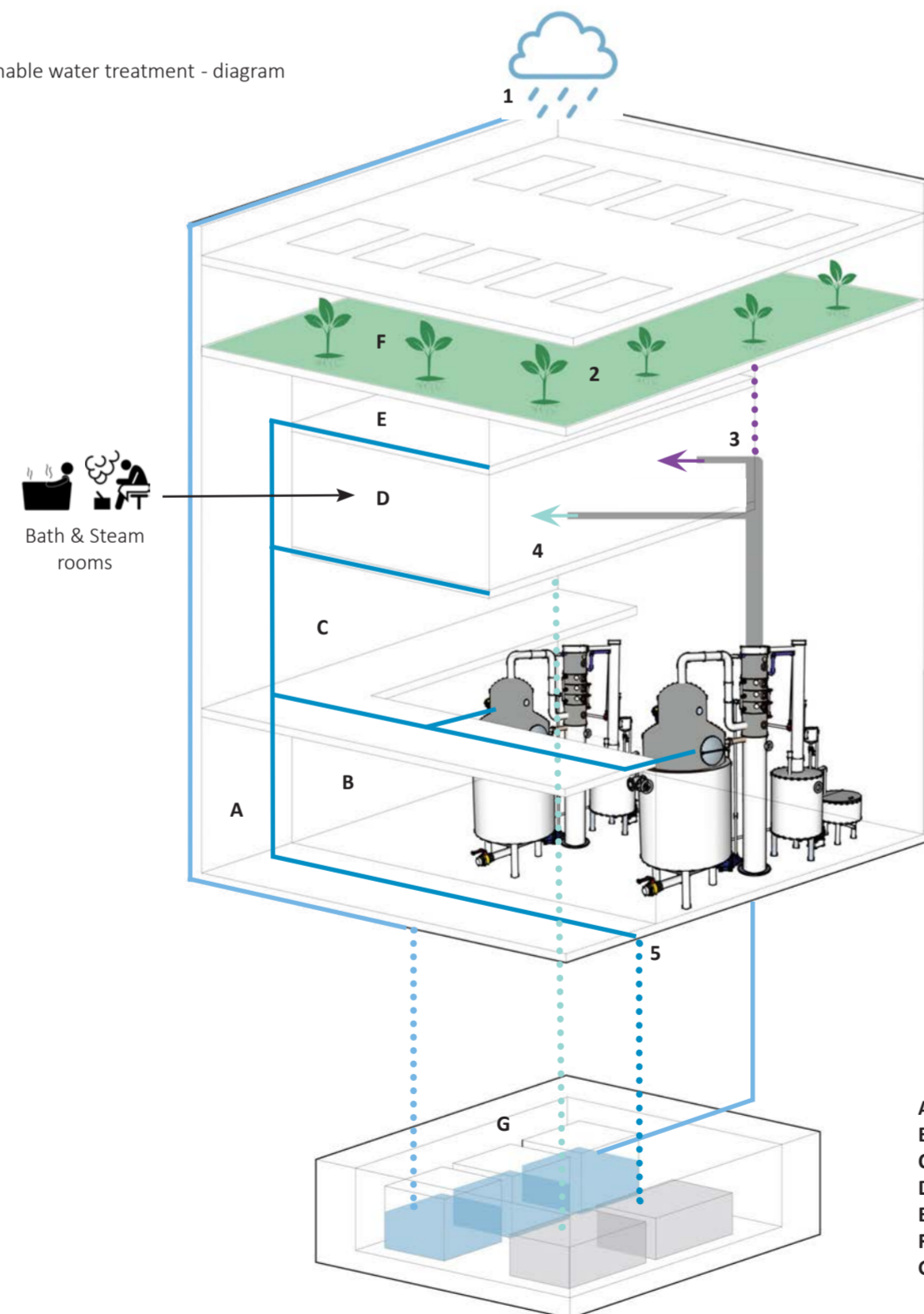
DISTILLERY

The building will have a rainwater and greywater treatments to avoid any waste. Each liters ofcollected water will be dispatched to heat the hammams and grow the plants.

Greywater treatment collects wastewater from washing machines, showers or baths. The water is disinfected by using ultra-violet light or special chemicals to eliminate dangerous bacterias.

Rainwater can be used but it may contain pollution, animal excrement and other particles which are harmful to humans, plants and animals. Thus, the water needs to be treated before use.

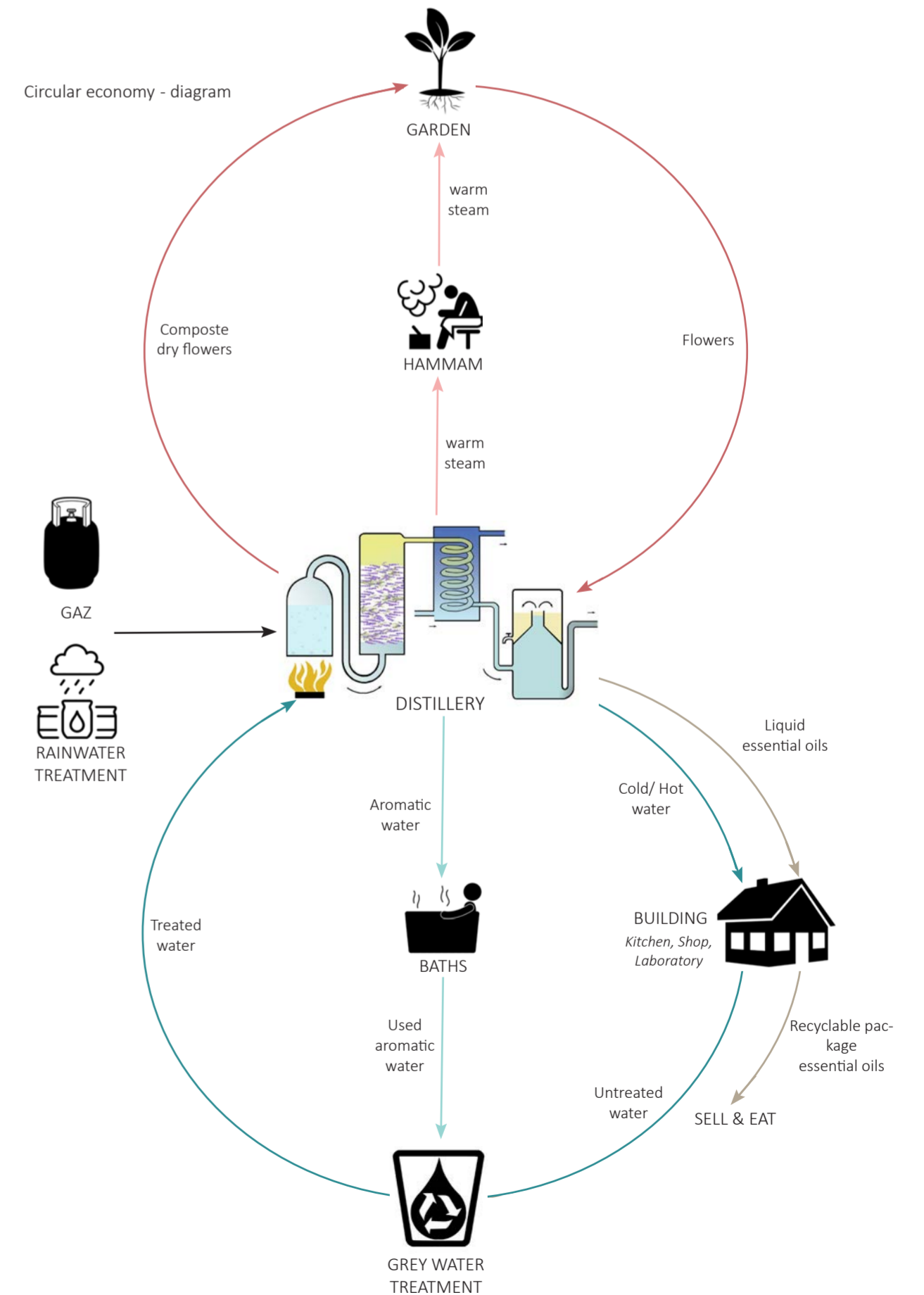
Sustainable water treatment - diagram



- A Shop
- B Distillery
- C Laboratory
- D Bath & Steam rooms
- E Tea room & Kitchen
- F Flower garden
- G Rain & Grey water treatment stokage

- 1 Water is collected from the building's roof and then use in the distillery process
- 2 Flower Garden to be distill and create essential oils & aromatic water
- 3 Energy produced by the stills to be used as an additional heating source
- 4 Aromatic from the distillery to be used in the baths
- 5 Grey water control

Circular economy - diagram

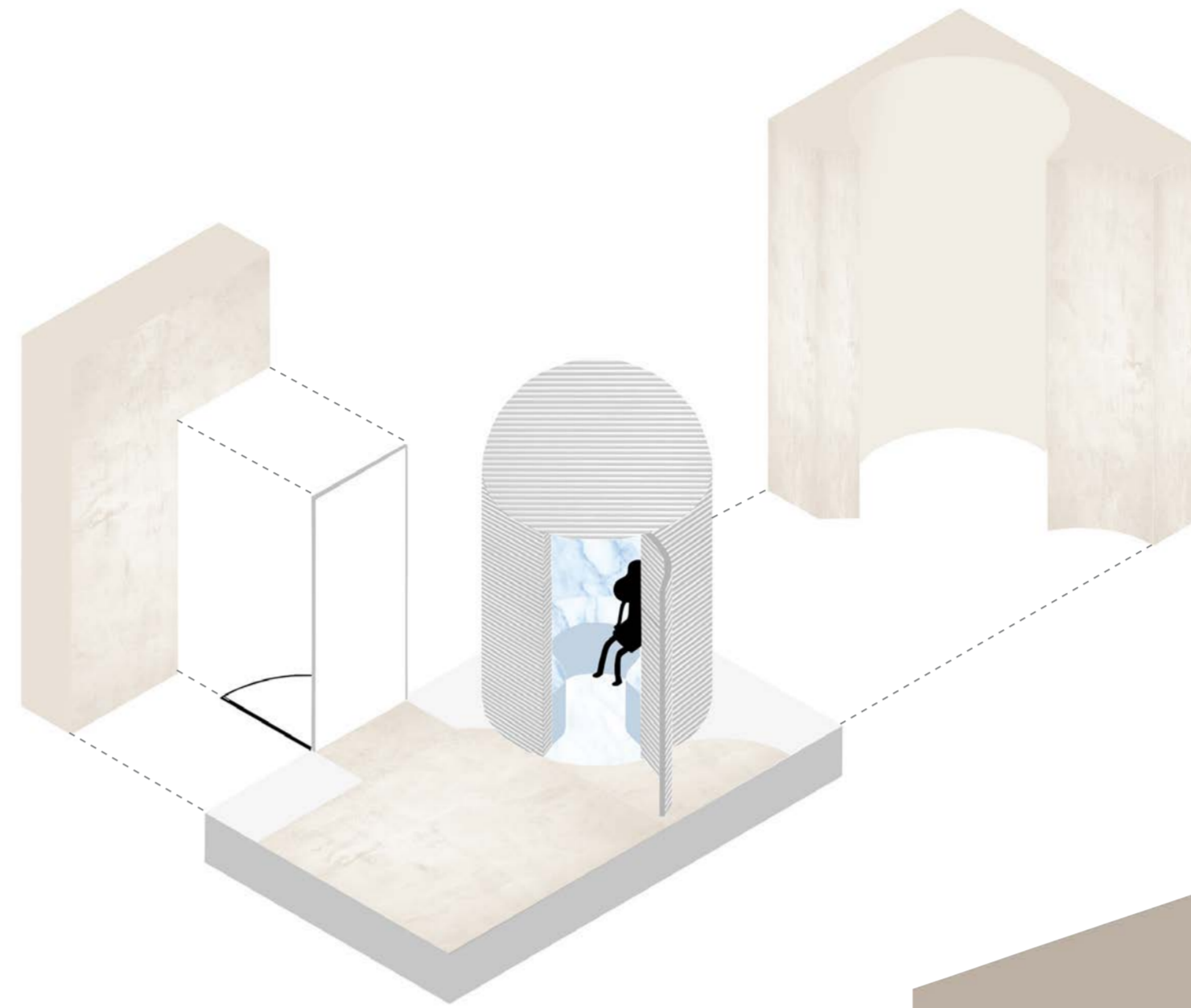


HAMMAM DESIGN

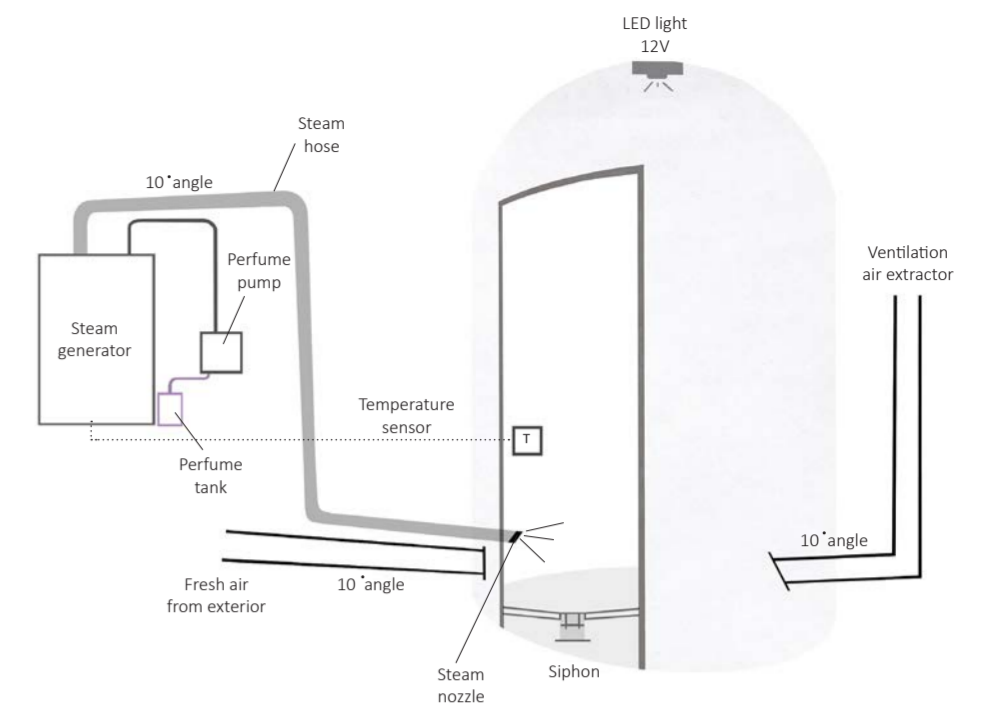
In Architecture and Interior Design, 3D printing is used for model making, creating complex shapes, prototypes and building components.

This digital fabrication process also promotes sustainable design through examples as 3D printed concrete which involves cement, fibres and other ingredients mixed in with water. 3D printed concrete is resistant to different stressors such as *heat, water and corrosive chemicals*. It can withstand temperatures up to 70 degrees.

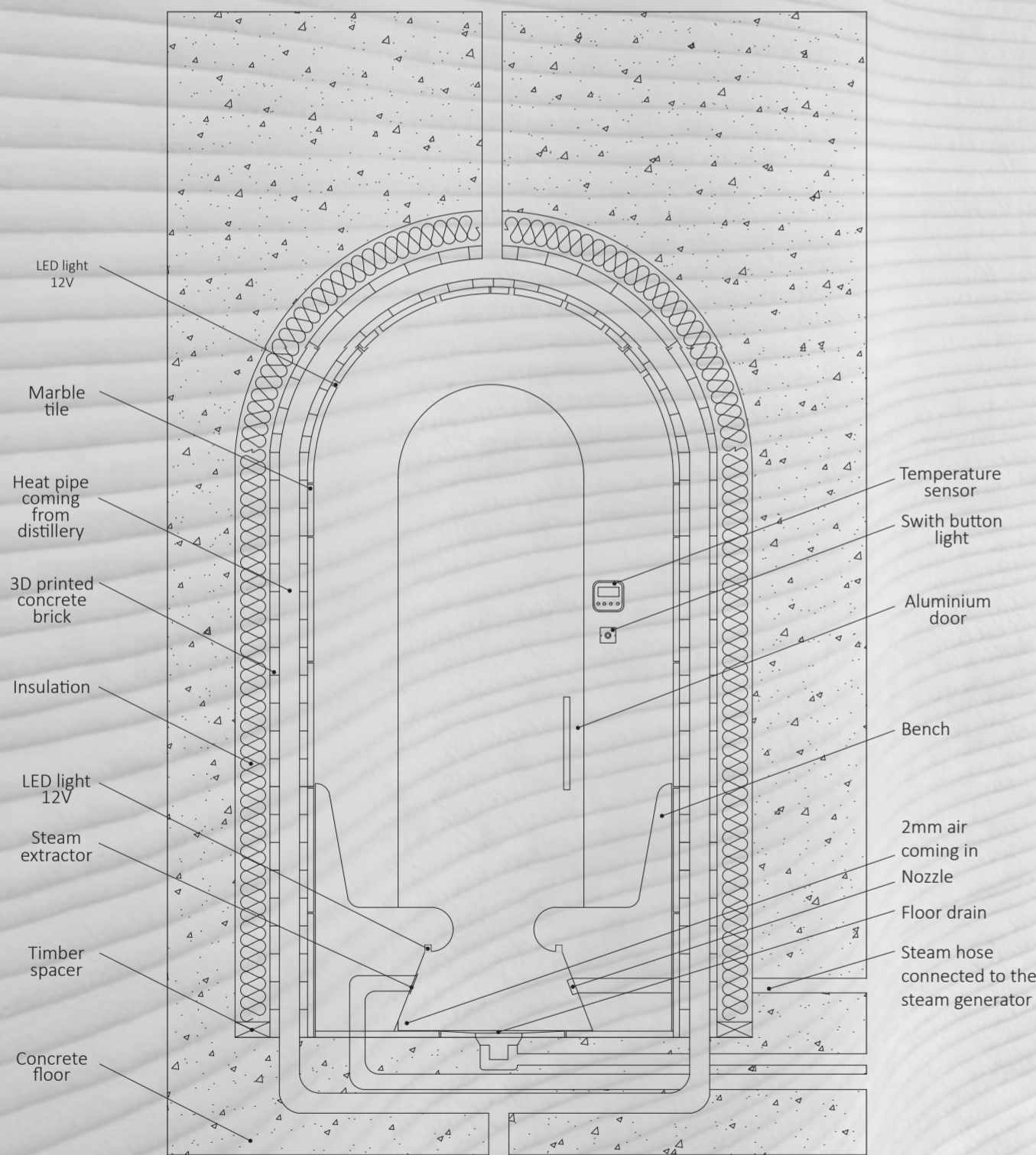
3D printed components are precisely fabricated layer by layer. This is called additive manufacturing. Products can be manufactured a lot quicker than traditional methods. Complex forms can be designed in just a few hours using CAD.



Exploded axonometric hammam drawing



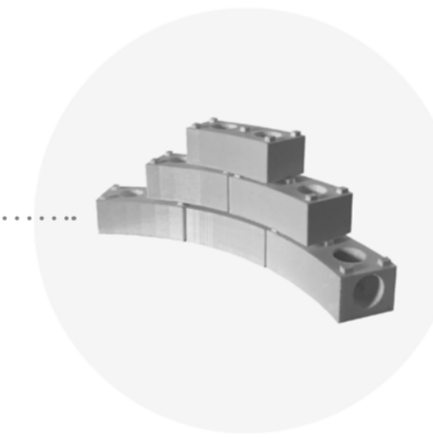
Hamмам machinery operation - diagram



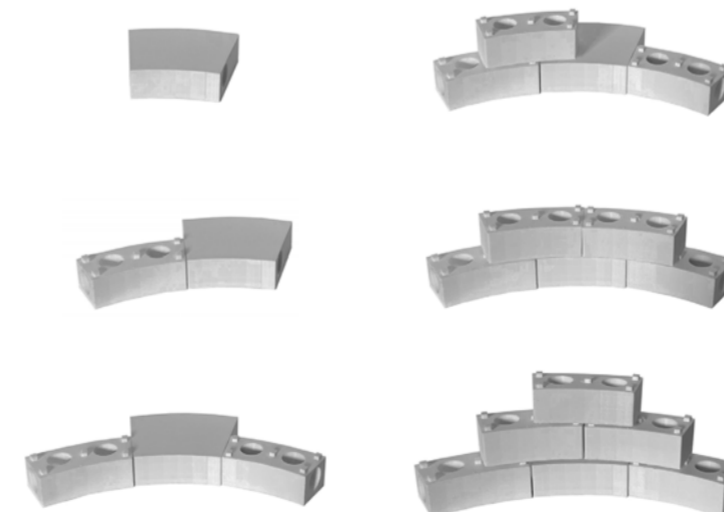
Hamмам Detail drawing 1:10



3D printed hammam



3D printed brick connection



3D printed brick connection



Visualisation - Hammam space

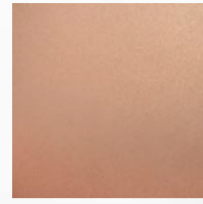
PROPOSED GARDENS

LONG SECTION

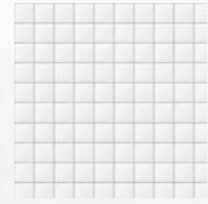
- 1. Southwark Street
- 2. Essential Oils shop
- 3. Distillery
- 4. Laboratory
- 5. Private Terrace garden
- 6. Panoramic view
- 7. Changing rooms
- 8. Hammams
- 9. Tea room
- 10. Public garden
- 11. Pathway
- 12. Railways



Original timber



Copper



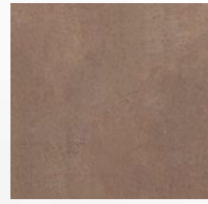
White tiles



3D printed concrete



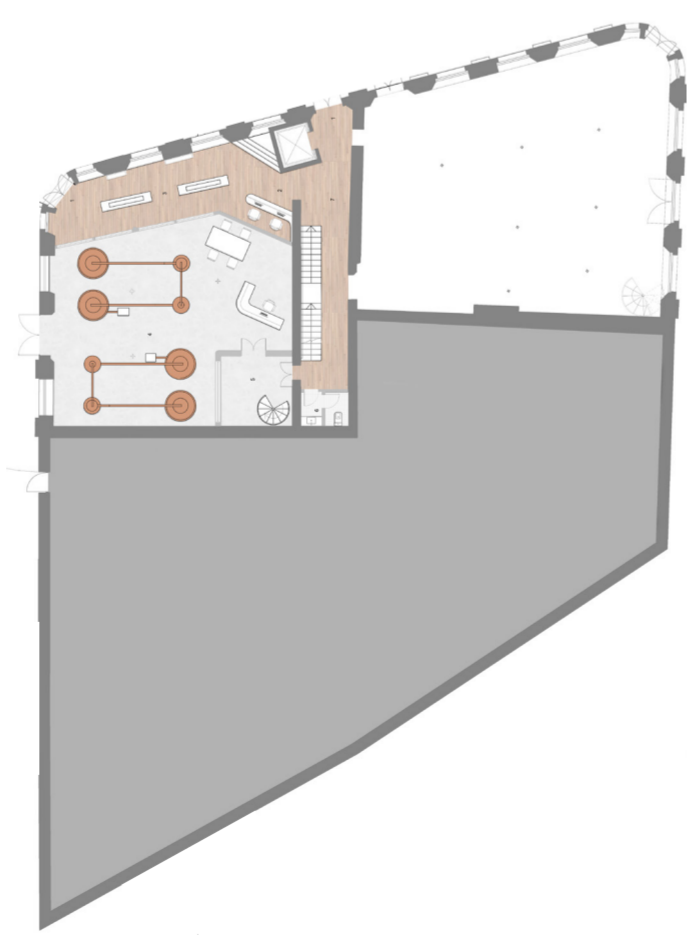
Marble



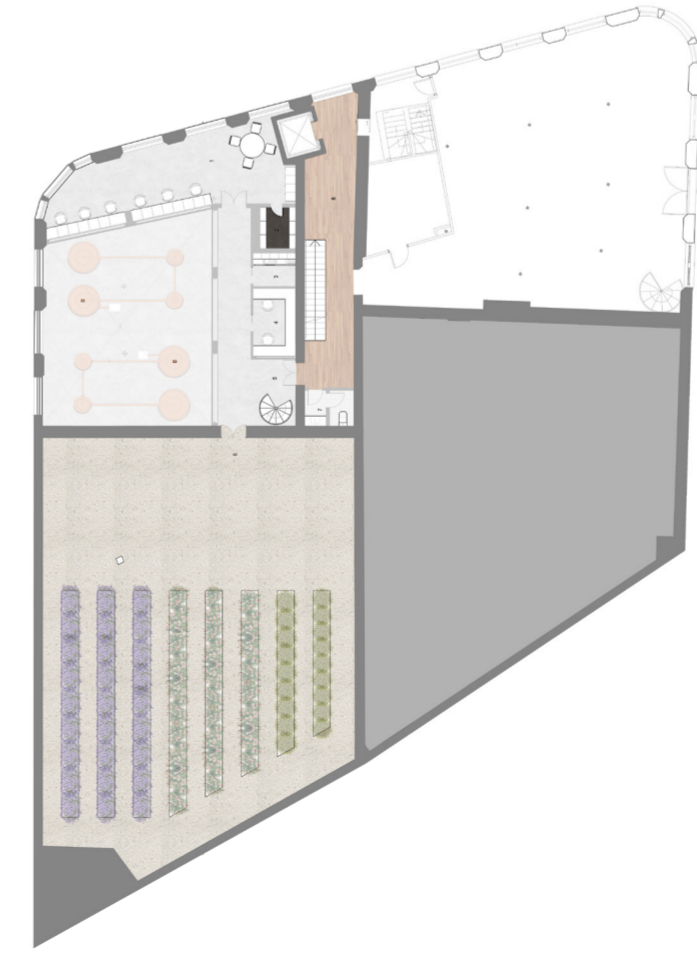
Weathering steel



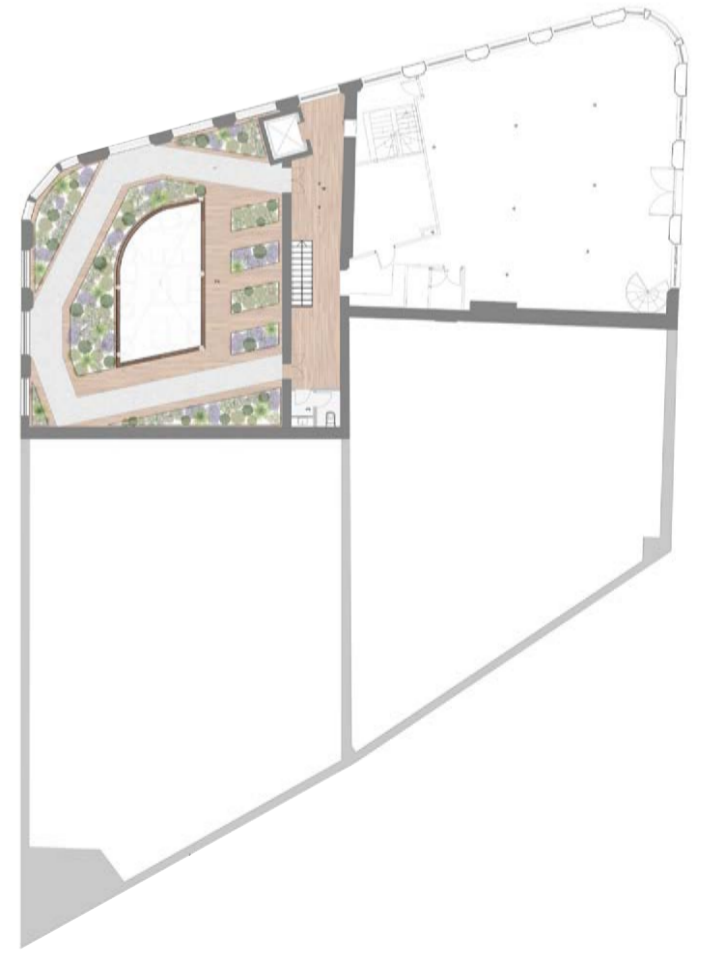
Visualisation Public Garden



GROUND FLOOR PLAN



FIRST FLOOR PLAN

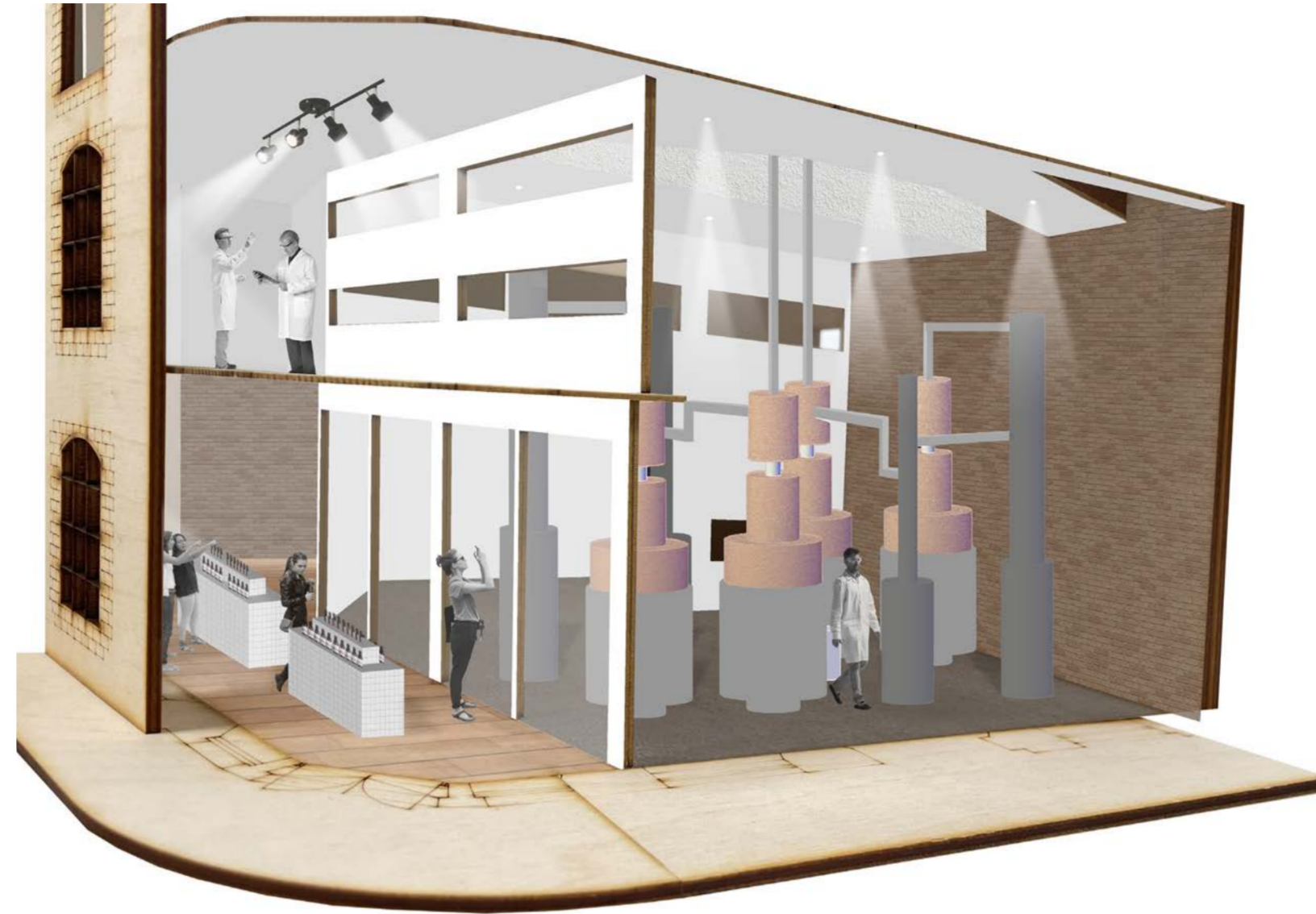


SECOND FLOOR PLAN

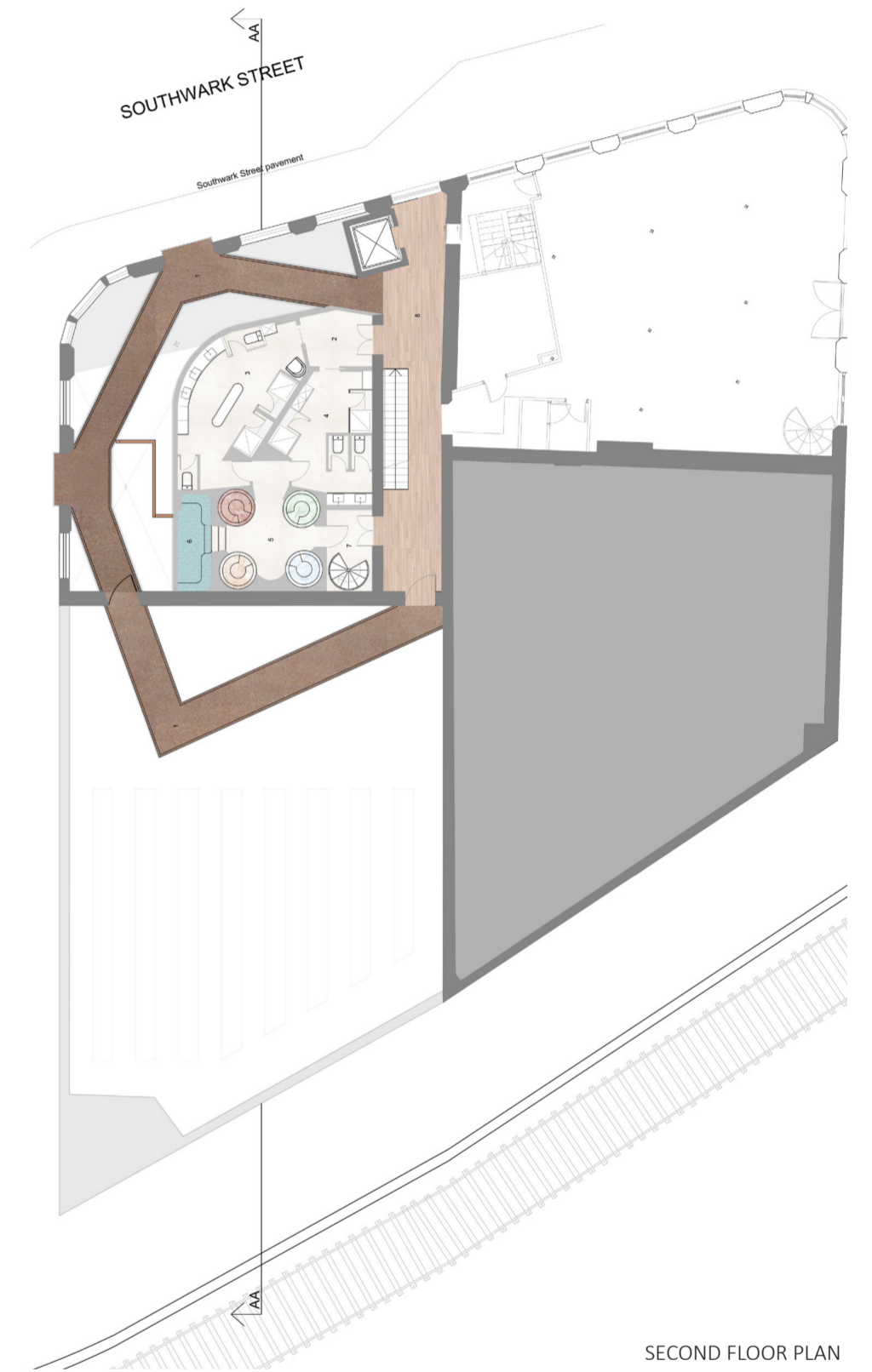
PROPOSED SPACES



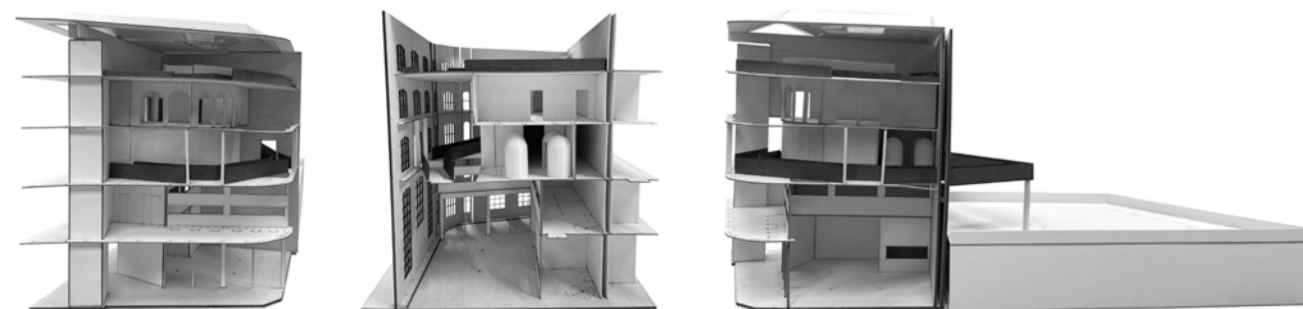
Visualisation - Panoramic view



Visualisation - Entrance & distillery



SECOND FLOOR PLAN



Model front view

Model back view

Model side view



Visualisation - Private garden