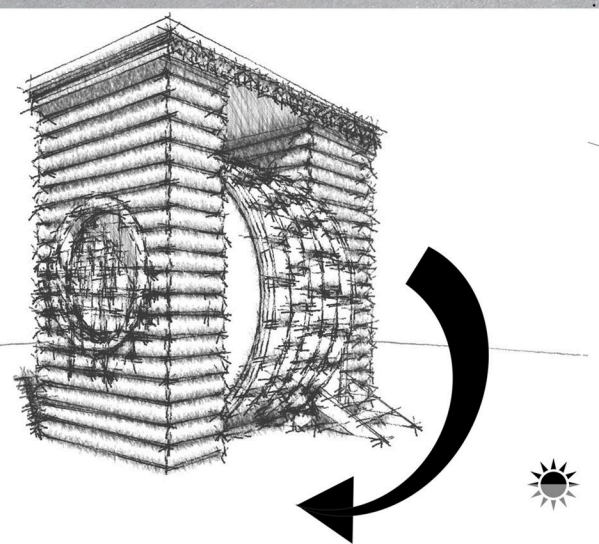




# solaris 15

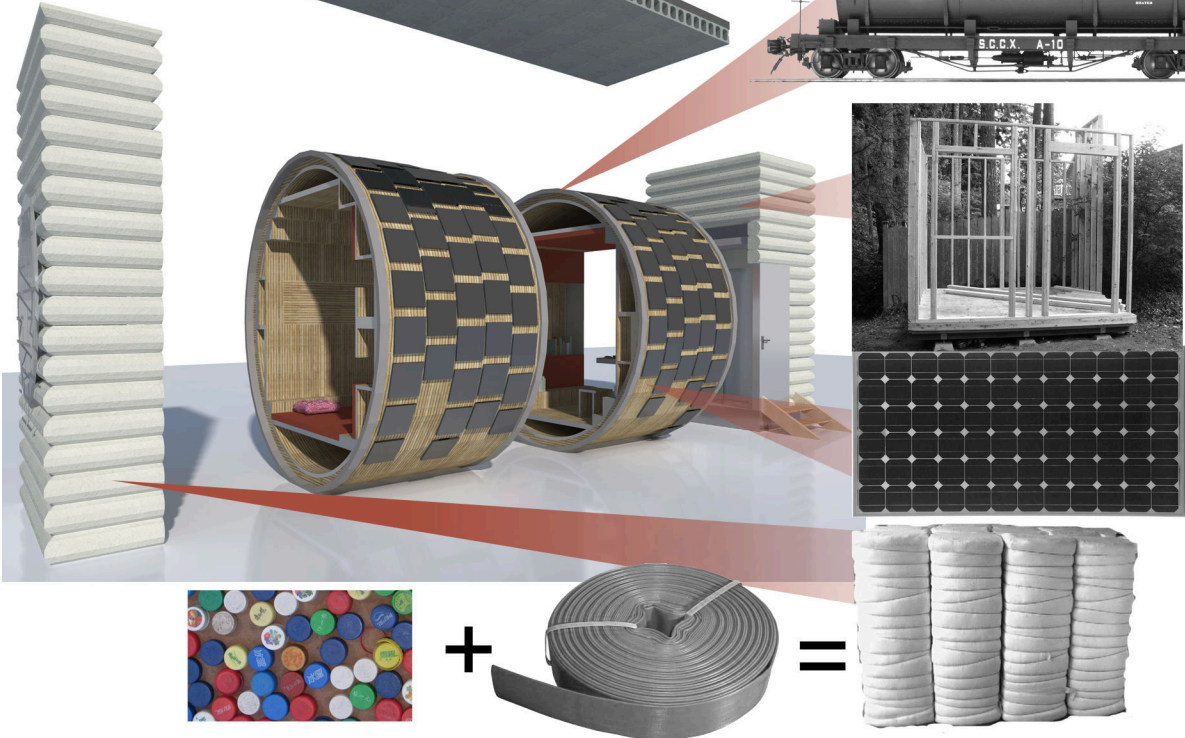
15 m2 gross floor area  
4 m high  
recycled materials  
water saving  
solar energy  
variable roof construction  
(if necessary, green roof, solar panels, etc.)  
extreme new design  
human relations  
flexible space  
local materials  
local climate conditions  
house live together with inhabitants  
global economy  
(minimal household objects)  
can be arranged in colonies  
dispatched  
(labor / job migrations)  
cheap  
sustainable  
natural  
develop new local  
handmade industries



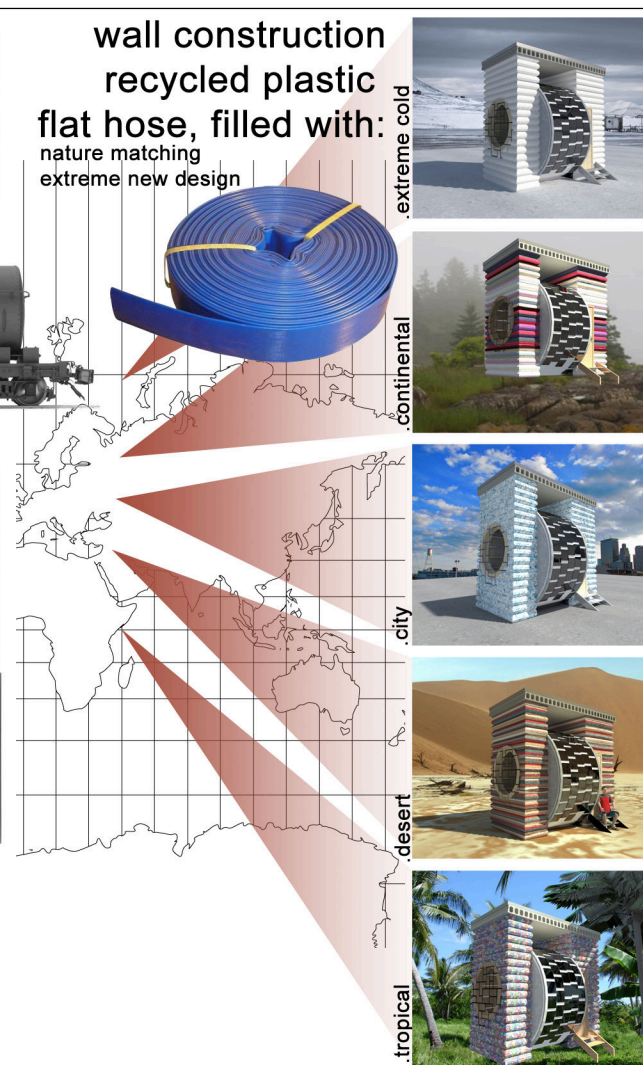
Cylinder-part of the building from the inside manually rotatable. The interior is furnished in advance with the necessary functions. The solar panels on the cylinder are economically located, addition with the internal functions. As a function of internal changes, so does the solar panel position. Functiontypes four typical usage are pre-designed countless variation possibilities. (See technical pages)

## .what is it made of?

ceiling: pressed wood waste  
rotating cylinder: recycled metal tank  
wall frame: recycled wood or metal work  
wall filling: local waste or naturale material filled in recycled flexible tube (sand, adobe, woodcheaps, textile waste, plastic caps, PVC or PE, salt, etc.)



wall construction  
recycled plastic  
flat hose, filled with:  
nature matching  
extreme new design



## modular

The rollers are separate living quarters. With one after another placing, combining of the rollers can be developed 10-15-20 ... etc m2 unit.



SOLARIS 10 (1 cylinder), gross area: 10 m2, home for 1-3 person



SOLARIS 15 (2 cylinder), gross area: 15 m2, home for 2-5 person

## symbolism

SOLARIS 15 messages for today...Just think about it...  
**.Plan your future.** Think about your future step.  
(In Solaris 15 people has to be necessary to determine the next minute feature for which they need to do (to rotate the cylinder).)  
**.Object-consciousness**  
(In Solaris 15 only those objects can be used when really necessary)  
**.Call to design space-minimalism**

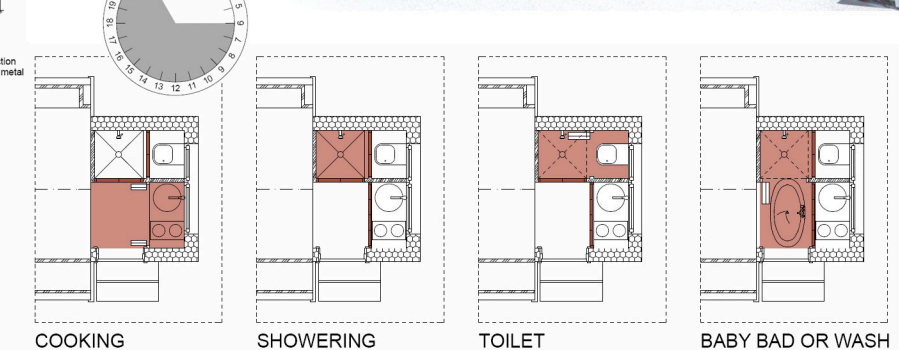
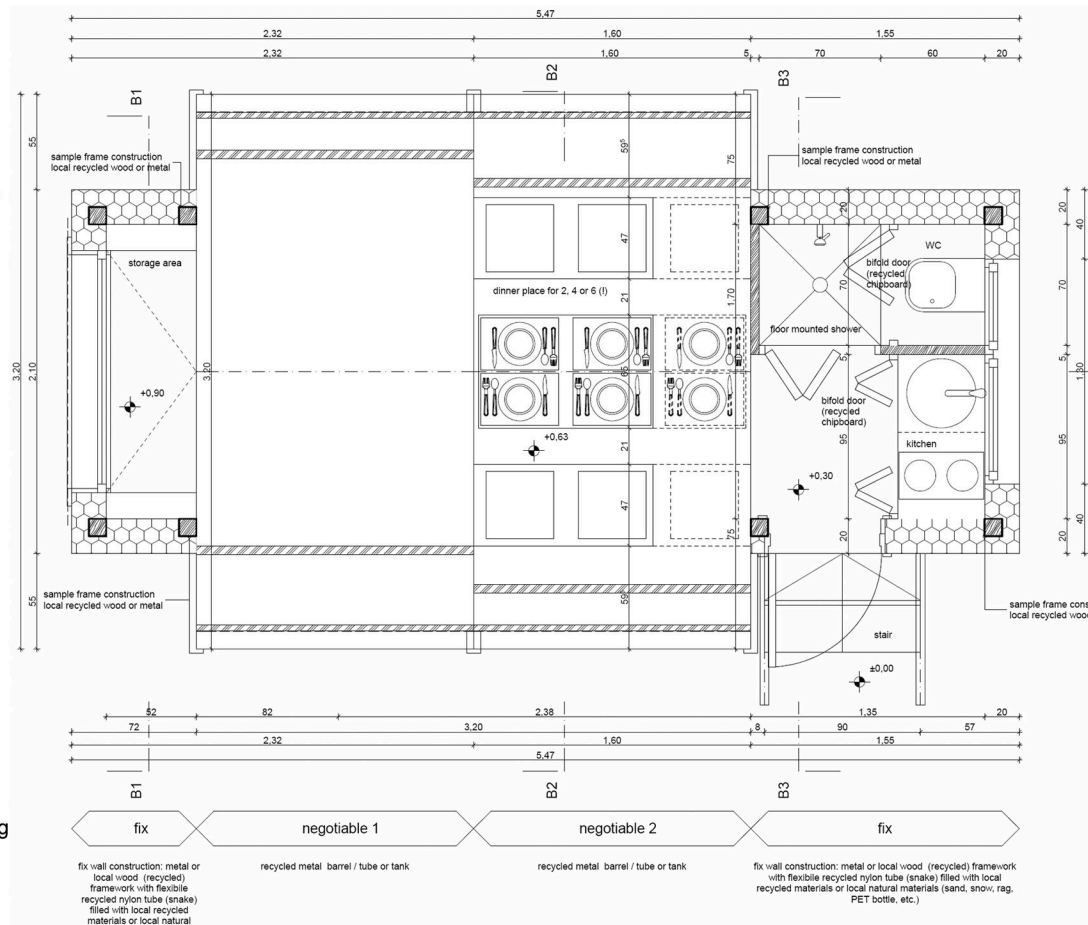


## Waseda Architecture Centennial Design Competition

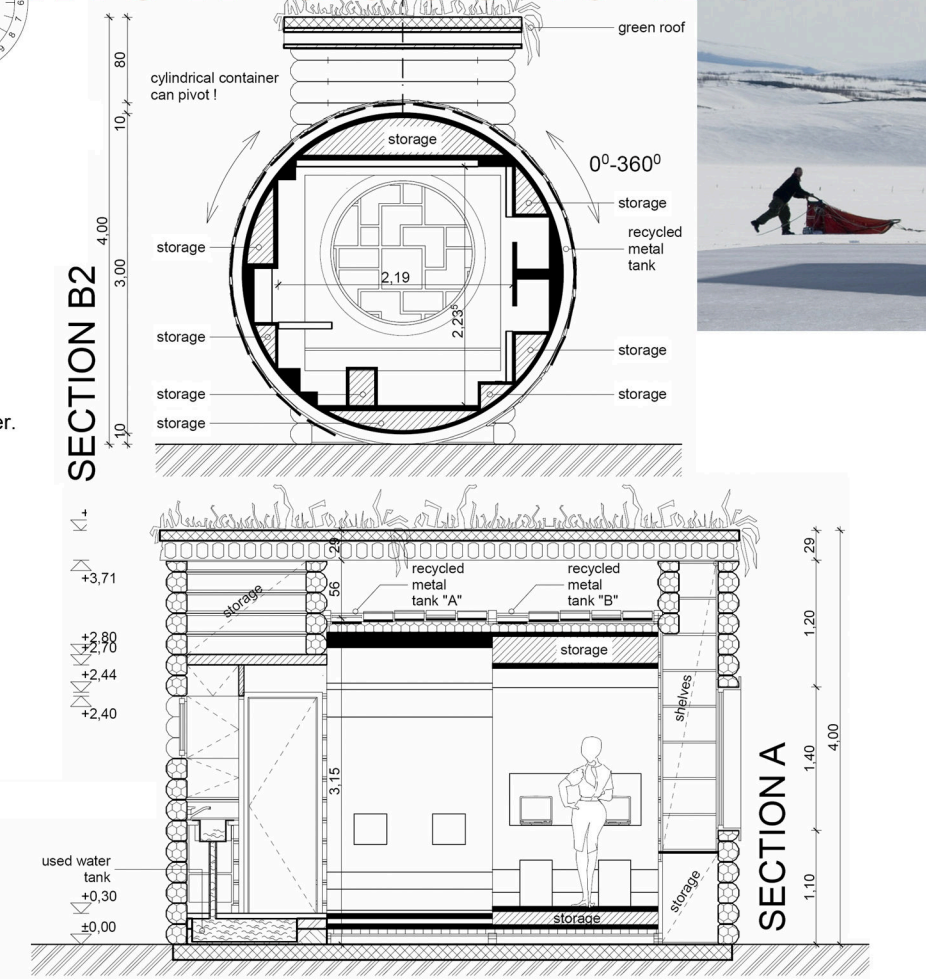
## .what is it?

The basic idea of the SOLARIS15 was the creation of a building that is responsible for the future. The building wholly lives together with its environment and with the people living in it. The essentially enough space always can be reached by moving the tank to the position of each desired functions. The filled energy level is changing together with the moving of the tank.  
The building mass comprises two elements, a squared, fix (woven from hoses filled with recycled or local materials) as well as a roller (recycled metal tank covered with solar panels) that can be rotated by hands inside.  
The fix parts are around a simple stiffening frame.  
The bathroom, the kitchen, the entrance and the big storage are located here.  
The movable roller has 4 position to use according to the demands day or night time (so being convenient for free space, sleeping, dining, working / learning).  
The SOLARIS15 gives a complex answer to global problems affecting the whole mankind:

- overpopulation:** however its gross floorspace is only 15 sqm it is still comfortable, multi-functional, habitable
- waste Management:** its wall is built of 100% recycled or naturally occurring materials.  
The structural frame made of recycled wood or metal is rounded by hoses filled with the most specific usable local materials.  
The hoses can contain: sand, clay, snow, wood, textile, plastic chips, PET bottle caps.  
The manually movable cylindrical central part of the house is made from recycled big drums or pipe.
- plant, green, oxygen:** the flat roof of the building can be used for planting or placing rainwater collection basin
- water:** Under the floor of the building the not heavily contaminated water can be stored for use by toilet, laundry, etc. The flat roof of the building provides an option to collect rainwater as needed.
- thrift:** The small space served opportunities significantly reduce the amount of household objects and ornaments so limiting the unnecessary purchases.
- energy:** The necessary energy of the building is provided by the solar panels placed on the metal cylinder made of recycled materials.  
The economic insulation is solved by the chosen materials filling the hoses as well as by the design of the flat roof. (Eg roof insulation in cold climatic conditions, water container in warm climatic conditions)
- transport energy:** the used materials can be selected in accordance with local conditions.
- human relations:** a small living space need more community space. Prevent feelings of confinement, the turning inward offer a solution for treat-place up to 6-8 people
- settler layout possibility:** can be classified in different ways, so next to each other, or placed one above/under the other, over-all villages can be designed.



## .how does it work?



## Personal Info



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## Dora Edelmann



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Head of design  
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Graduated at The Budapest University of Technology and Economics at the Faculty of Civil Engineering.  
Won the ÉTE diploma awards and a praise from the IMF Foundation.  
Made her doctoral dissertation in the topic of lighting of sacred buildings at the Technical University of Graz at the Faculty of Architecture.  
Had taught for 5 years at The Budapest University of Technology and Economics at the Department of Building Construction first as a phd candidate, later as an assistant professor.  
Participated in the design and presentation works of several office buildings, shopping centers and residential park.  
Head of design at the Engineering Co-operation Budapest Ltd