Press Release

Start Somewhere completes construction of the world's first massive school building with the newly developed hollow concrete blocks

- Pilot project successfully completed on time despite Corona pandemic
- Convincing construction system: fabrication of the blocks and construction of the school was done independently by local workers in Kibera, Nairobi
- Two-storey school building made of innovative construction system with curved walls and without mortar

KIBERA, 11 October 2020 - The last blok has been laid: The first massive school building made of the newly developed hollow concrete blocks is ready for use and creates space for more than 400 pupils and teachers. The building system was developed by the Munich-based social start-up Start Somewhere specifically for informal settlements and the challenges associated with them. In the last six months, more than 7,200 bricks were manufactured on site in the company's own hollow concrete block factory and finally installed. The Kenyan project manager Lazarus Asewe was always in direct contact with the three-member Start Somewhere team in Germany. Due to the Corona pandemic, the architect and project initiator, Oliver von Malm, was unable to supervise the construction on site. High-tech planning with a specially developed app and low-tech execution with experienced craftsmen, some of whom had previously been trained by Start Somewhere, made it possible to implement the project completely independently. The necessary coordination took place completely "remotely", i.e. from a distance via video conferencing. The project manager in Kibera walked the site with Oliver von Malm in Germany - via smartphone. A training session held at the beginning of the year had provided the entire team on site with excellent training in the necessary special procedures. Thus, the construction could be carried out as planned despite the unexpected circumstances.

The construction process

The construction was divided into two phases: The first phase comprised the ground floor and all the work that was necessary beforehand, such as demolishing the old building and levelling the building ground. This was followed by the foundation and the first row of the new concrete hollow blocks - as the basis of the entire building, these first steps required particularly special care. Within a few days, the workers from Kibera set the entire blocks of the ground floor with skill and craftsmanship. The modular, mortarless plug-in system is ten to fifteen times faster than conventional masonry. The windows and doors were supplied by local craftsmen. Even the bending of the 16-millimetre steel rods for the columns and ring beams was done by hand by the trained steel weavers. After a second production phase for the remaining hollow concrete blocks, the second floor - with a multitude of

work steps repeated from the ground floor - could be put up very quickly. "Challenges of the upper floor, such as light shafts to be installed, which allow daylight to flood from the upper floor into the rooms at ground level, were mastered by the team without any difficulties," says Oliver von Malm. "One special feature worth mentioning is the shape of the building, because in some places it was necessary to build it round. This was only possible thanks to our innovative, angle-free construction system," he adds. After completion of the upper floor, the rear-ventilated roof could be put on. A suspended plasterboard ceiling between the roof and the classrooms ensures that the heat radiation does not reach the inside of the building. This is to achieve a pleasant room temperature for the pupils and teachers in relation to the outside temperature. The indoor climate is further enhanced by the "thermal mass" of the walls, which is provided by the material and the thickness of the hollow concrete blocks.

The construction and operation of the hollow concrete block factory as well as the school building were funded as part of a pilot project by the Deutsche Investitions- und Entwicklungsgesellschaft mbH (DEG), a subsidiary of the KfW Bank, and by PERI, one of the largest manufacturers and suppliers of formwork and scaffolding systems.

Outlook

The construction and successful completion of this pilot project has caused quite a sensation in and around Kibera. We are very happy to have successfully completed a first important step towards our vision together with the team in Kibera," explain Kristina Cress and Silvia Hesse from Start Somewhere. More hollow concrete blocks have already been sold, delivered and installed to other local non-profit organisations in the recent past. Currently, there are further enquiries from local companies, organisations and private individuals who are showing great interest in the new building system. The goal that the factory will soon be financially self-supporting is getting closer with every interested party. The medium-term goal of Start Somewhere is to enable the creation of value in self-sufficient economic micro-units in slums. This will create jobs and a self-sustaining and gradually growing sector of the economy. The strong integration of the local population as a guiding principle enables scaling up to informal housing developments worldwide.

Kibera is located seven kilometres southwest of the city of Nairobi, within the city limits. According to UN Habitat, it is the second largest informal settlement in Africa. Estimates of the total population in the settlement range from 500,000 to 700,000 inhabitants: a density of over 2000 people per hectare, making it one of the most densely populated informal settlements in the city.

About Start Somewhere
Start Somewhere gemeinnützige GmbH is a social start-up based in Munich with eight years of experience in development cooperation in one of the largest slums in Africa: Kibera, Nairobi (Kenya). The vision of Start Somewhere is the sustainable improvement of living conditions in the slums of this world. Concretely, *Start Somewhere* develops a flexible, reusable, cost-effective and fireproof construction system for buildings in slums. The resulting hollow concrete blocks can be assembled and disassembled by hand as a modular, mortarless plug-in system. For the first time, any angle can also be realised steplessly in the floor plan.

In this way, the first school building is to be constructed as a pilot project in Kibera by 2020. Start Somewhere wants to enable the slum dwellers to produce the hollow concrete blocks themselves in a workshop on site and thus erect better buildings in the slum. Jobs and a local construction industry are created so that the added value remains in the slum.

As a non-profit organization, *Start Somewhere* supports two schools in the Kibera slum with currently more than 800 children through donations. This includes two daily meals at school, medical care and school equipment.

The PERI Company
With a turnover of € 1,560 million in 2018, PERI is one of the largest manufacturers and suppliers of formwork and scaffolding systems. With around 9,500 employees, 70 subsidiaries and well over 160 warehouse locations, PERI serves its customers worldwide with innovative system equipment and comprehensive services for all aspects of formwork and scaffolding technology.

Note to the editors:
We are happy to provide you with pictures. Please contact our media contact.

Responsible:

Kristina Cress
Managing director
Start Somewhere gemeinnützige GmbH
Brunnerstrasse 3
t: 0049 (0)17624296330

m: info@startsomewhere.eu
hp: www.startsomewhere.eu
fb: www.facebook.com/let.us.start.somewhere

Media Contact:

Karsten Hoppe
TDUB Kommunikationsberatung
Hongkongstraße 7
20457 Hamburg

t: 0049 (0)40 8079212-20
m: kh@tdub.de
hp: www.tdub.de