The State Office for Refugee Affairs (LAF) began its work on August 1, 2016. His tasks are the registration, care and accommodation of refugees in Berlin. A lot has happened since the LAF was founded. A lot of energy was put into building new structures, and the conditions have noticeably improved for the refugees.

The LAF Berlin Refugee Shelter is a stand-alone building with 660m² of living space spread over six floors and an outdoor area of around 300 m².

The Berlin District Office for Refugee Affairs requires a stable and area-wide high-performance network throughout the refugee shelter to provide refugees with a convenient and connected life.

TP-Link needs to supply the refugee shelter with a seamless and stable network that is physically separate from the administration network.

- The building does not have its own Internet access. This means that neither cable nor DSL connections are available.
- No cable ducts have been installed and, due to fire protection regulations, no changes may be made to the facade, either in the form of cables or drilling. This also applies to the interior walls of the mezzanine floors.
• How to ensure that the WLAN network is fed via a connection from the main building.
• How to ensure reliable WLAN for high user densities without changing the structure or laying cables.

So far, this project has been tackled unsuccessfully in several attempts with different manufacturers. No competitor was able to meet all the requirements, leaving the building undersupplied.

❤️ SOLUTION

The system house IT Allroundservice GmbH, which is responsible for the district office, suggested TP-Link Omada. With TP-Link Omada Access Points, Easy Smart Switches and Omada Software Controller, TP-Link SDN solution supplied a seamless and stable network that is physically separate from the administration network, meeting the above demands.

1. The DSL router in the main building A is supplied with Internet via LAN and serves as DHCP in this network. The software controller (runs on a Fujitsu PC, i5, 16 GB RAM) and an EAP 670 via LAN are connected to this router. The AP in building A was attached to a window (inside) and has visual contact with the receiver APs in building B to be served.
2. The receiver APs in building B (one AP per floor) were also attached to the window and connected to a switch. There are also two EAP660 HDs per floor on the switch, which were laid over the 15 meter long corridors via cable (Cat 6a cable).
3. The uplinks for the building opposite are done via the EAP670 from window to window through mesh.

![Diagram of the solution topology for the LAF Berlin Refugee Shelter](image)
**BUSINESS RESULTS**

Staff members and residents of the retirement home have expressed immense satisfaction. Even after three months of use, the system house and end customer are extremely satisfied with the solution and the manufacturer support and would recommend the products and customer support at any time.

**Related Recommended Products**

- EAP670
- EAP660HD
- TL-SG105PE
- Omada Software Controller