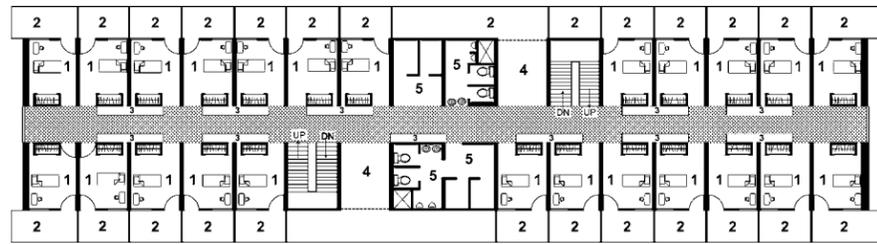
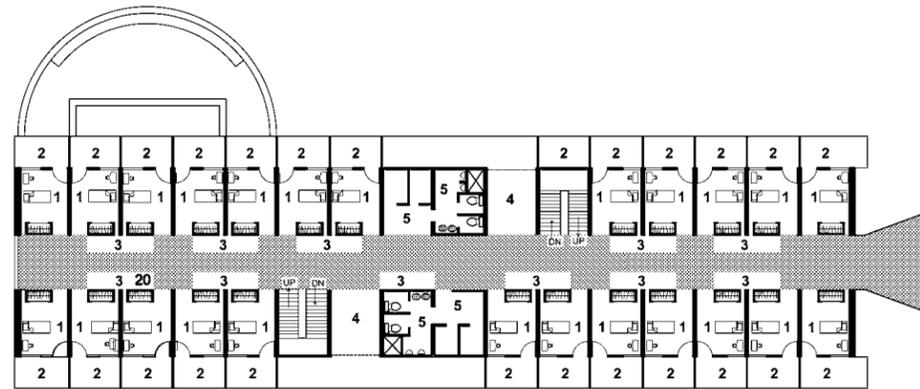


- 1. Cubicals
- 2. Balcony
- 3. Cut-out (void)
- 4. Dry space for clothes
- 5. Toilet block



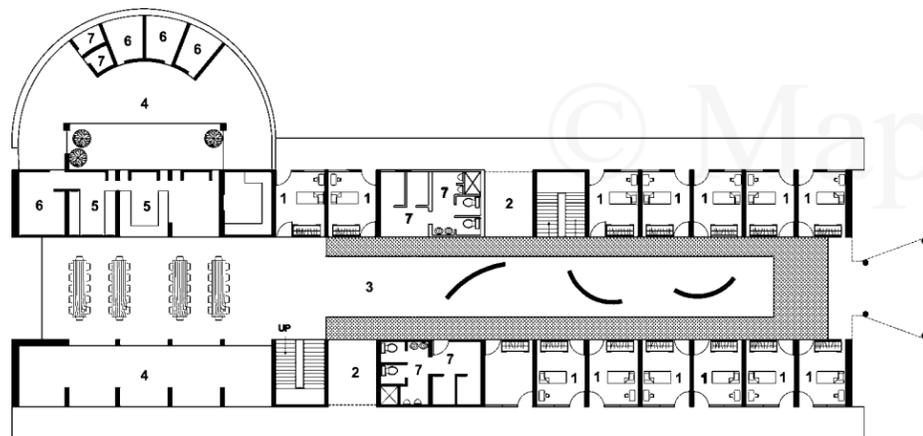
Second floor plan

- 1. Cubicals
- 2. Balcony
- 3. Cut-out (void)
- 4. Dry space for clothes
- 5. Toilet block



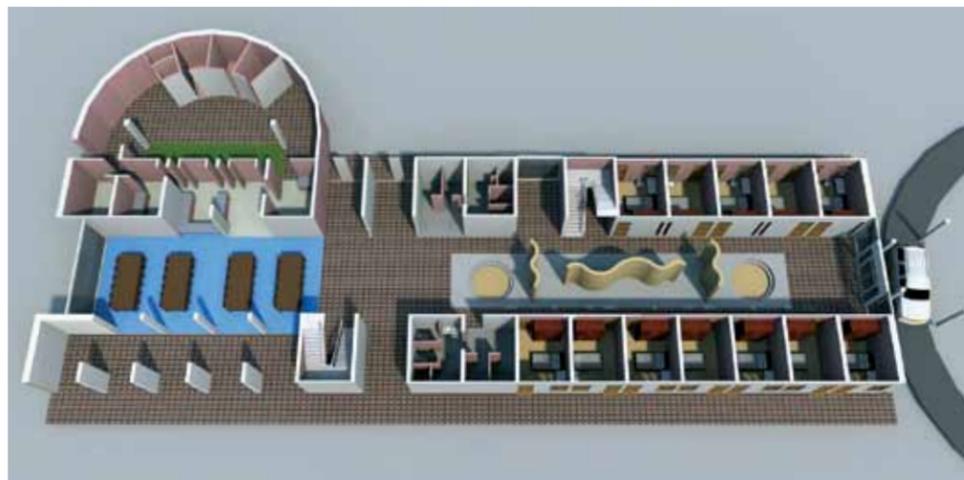
First floor plan

- 1. Cubicals
- 2. Dry space for clothes
- 3. Sunken garden
- 4. Veranda
- 5. Kitchen
- 6. Store room
- 7. Toilet block



Ground floor plan

On the ground floor, the central area is used for common facilities, such as dining, lounge, reception, reading, display, etc.

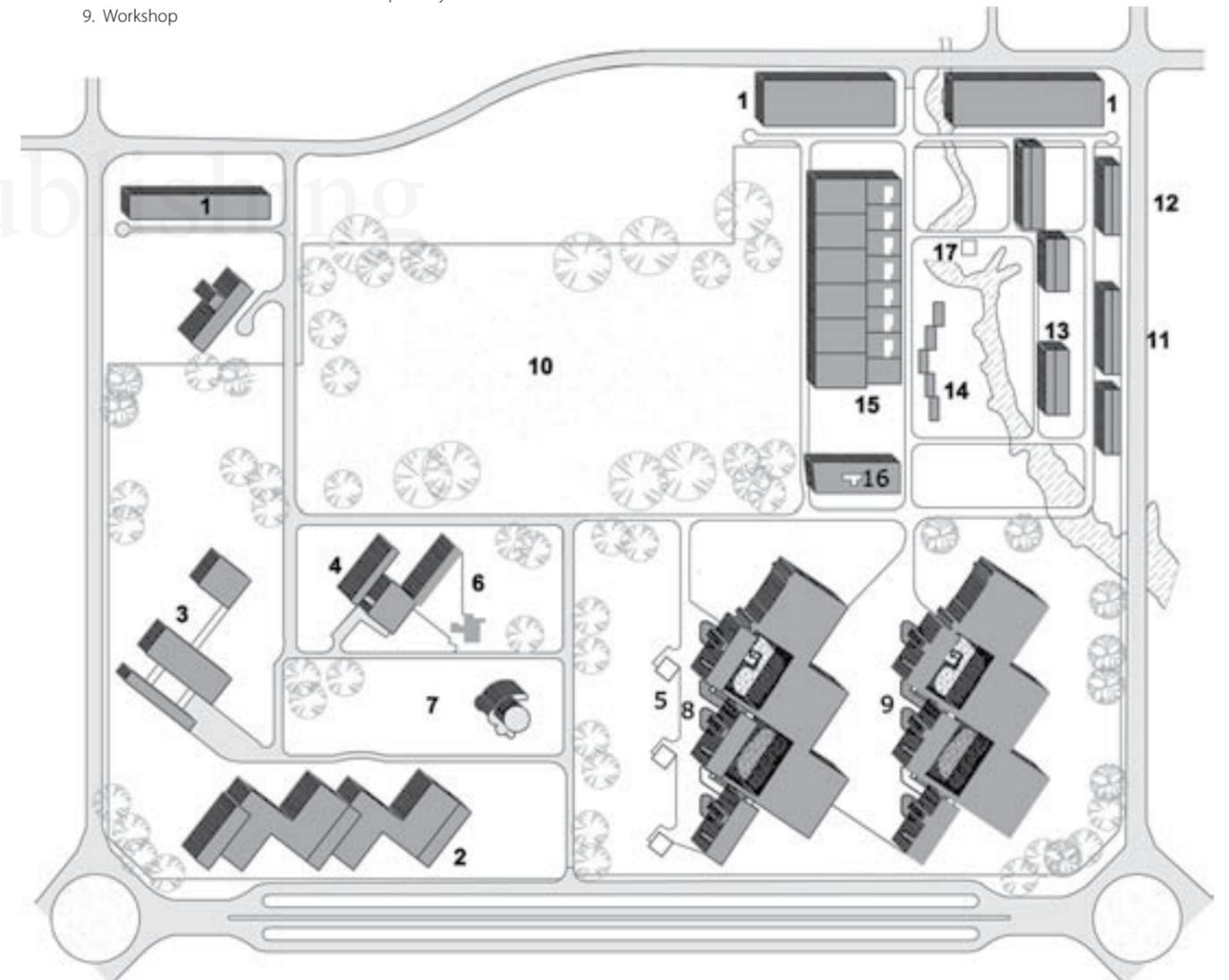


CENTRAL SCIENTIFIC INSTRUMENTS ORGANISATION

Half of Chandigarh's Sector 30 was sold to the Central Scientific Instruments Organisation (CSIO), a part of the Government of India's Council of Scientific & Industrial Research, to develop a campus. The layout of the CSIO campus, like that of Chandigarh's Panjab University campus in Sector 14, is based on a rational distribution of compact object-in-space buildings, oriented to the cardinal directions to optimise solar exposure. The housing, by contrast, was clustered around a creek in a more courtyard-based campus-like setting. CSIO's programme included workshops, schools, hostels, administrative buildings and laboratories. The Indo-Swiss Training Centre, financed by the Swiss government, was the first building to be built (originally designed by Aditya Prakash). Its folded slabs admit evenly distributed north light into the workshops. Ventilation is through the aluminium aerators provided in the external wall and openings in the north-light glazing.

- 1. Shopping
- 2. Laboratories
- 3. Indo-Swiss training
- 4. Hostel
- 5. Cycle stand
- 6. Warden's house
- 7. Canteen-cum-guest house
- 8. Administration block
- 9. Workshop
- 10. Play field
- 11. Type 1/1
- 12. Type 2/2
- 13. Type 2/3/4
- 14. Type 2/4
- 15. Type 6
- 16. Type 7
- 17. Dispensary

Master plan



Laboratory Building

The laboratory blocks are clustered together to create campus-like environs by the creation of interconnected courtyards. Each laboratory block is a four-storey building that is attached to a corresponding single-storey double height workshop. A ramp connects one block to the other. The staggered layout of the three units combines to create open-to-sky courtyards for use by the staff. The labs, 1,046 square feet each, were

designed to enhance rational organisation. These were the first in Chandigarh to have horizontal ducts (fed through two main vertical ducts). The actual laboratories were provided only on the north side to reduce glare, with the offices, stores, etc. located on the south side. Use of the connecting ramps also reduced the number of staircases required in the building to only one, and also functioned as a fire exit.

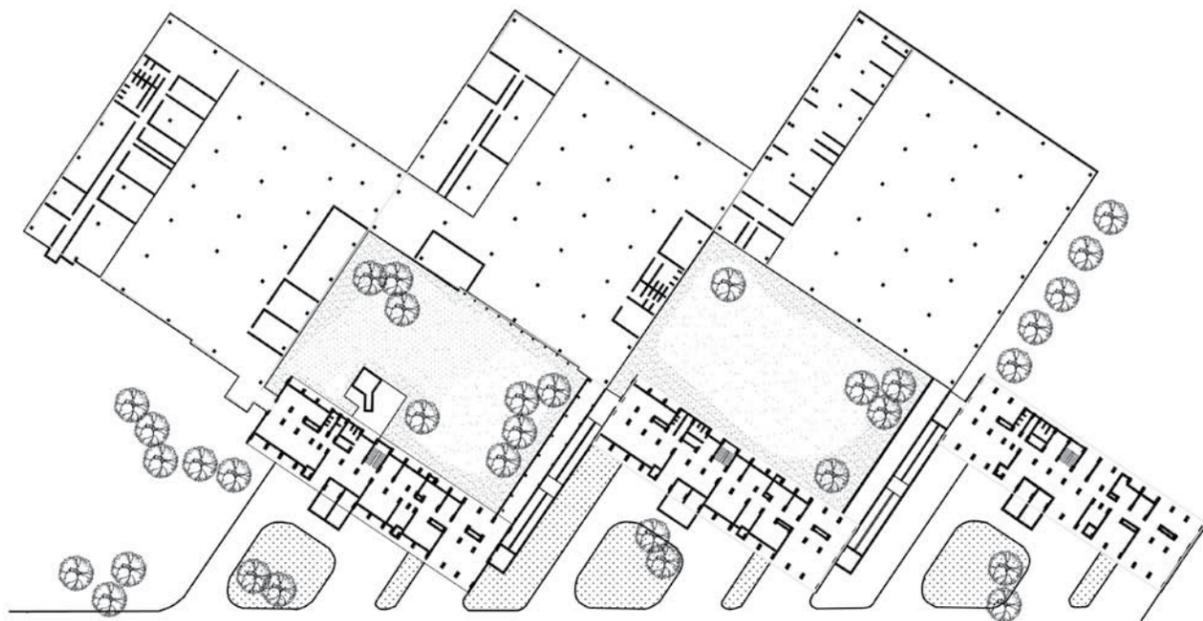


Above:
General view of campus

Right:
North light in the folded slab of the workshop roof



Below:
Plan showing layout of and connectivity between blocks



Cafeteria and Guest House

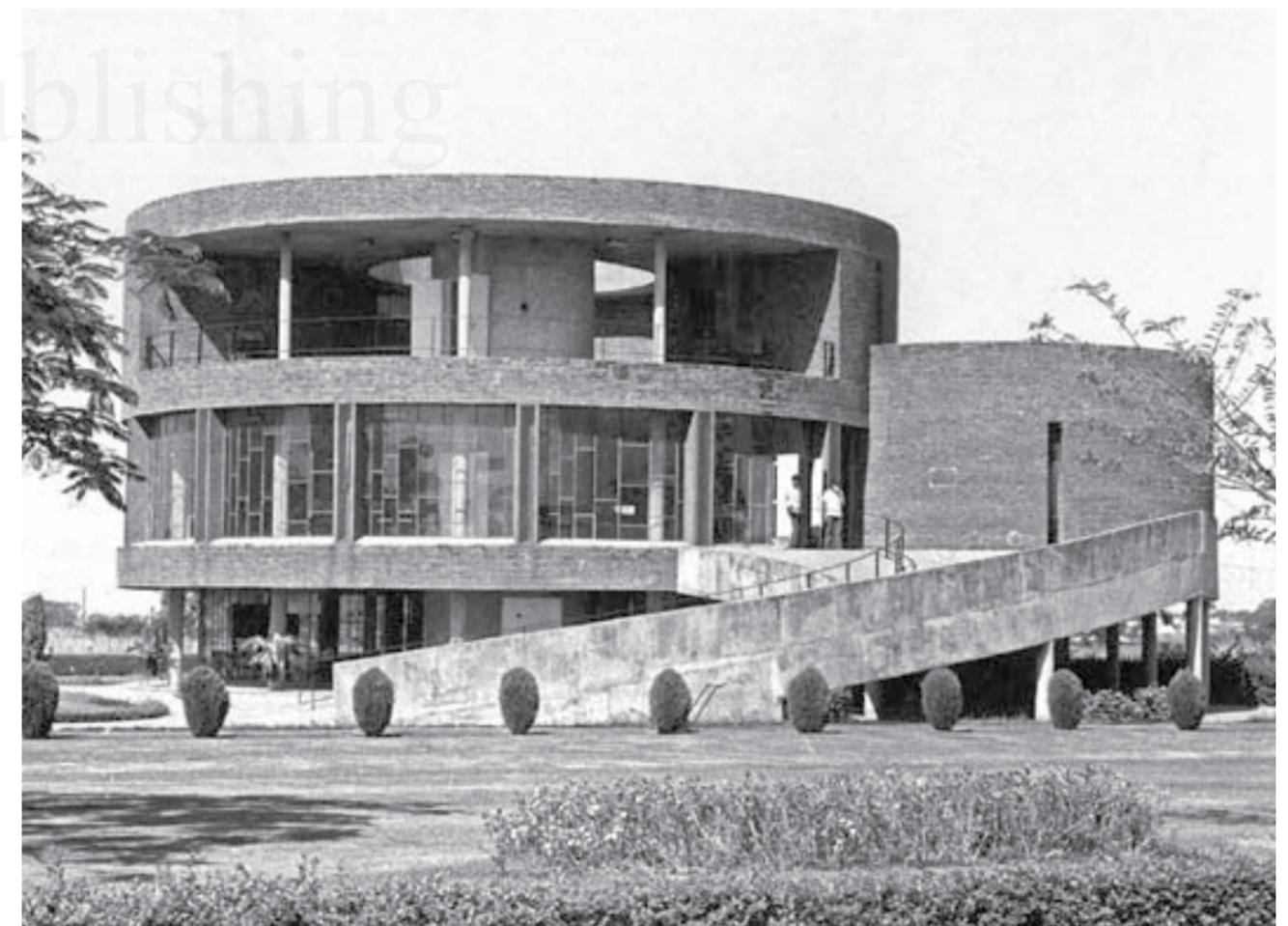
The CSIO cafeteria is consciously designed as a counterpoint to the straight-lined rationalised geometries of the rest of the structures of the campus. The cafeteria sits in the visual center of the campus (like Gandhi Bhavan in the Panjab University campus). But unlike Gandhi Bhavan, which squats on the ground like a lotus in a pool, the CSIO cafeteria lifts itself off the ground—raised on piloti and a ramp—to peek above its surrounds.

Such a determinedly self-conscious building could have easily been a debacle by being either over-designed or too bombastic. The CSIO cafeteria is neither. Its remarkably simple plans belie the skill with which the volumes and masses have been orchestrated to create piquant symphony of elemental modernist formal notes.

The cafeteria, kitchen, and toilets placed on the second floor are directly approached by a ramp designed to cope with the rush hour. Beams, fanning out in all directions from the external wall of the central staircase, support the roof. The western face has a cavity wall for thermal insulation. The added thickness of this wall enables the long and narrow slit windows to do without sun-shades.

On the ground, the games rooms and toilets are tucked behind to emphasise the freestanding columns. The second floor is simply a large open plan, with the place of privilege reserved for third floor, where three guest suites open onto a veranda, with an additional round skylight in the middle furthering its connection to the sky.

Ramp side view of cafeteria



Faculty Guest House

Conceived originally as a bachelors' hostel, this three-storey building now serves as a guest house for CSIO. Designed inside out, the building is best understood in plan. A large central courtyard forms the node around which connecting corridors have been resolved into a long and narrow, three-tiered bridge running the entire length of the building. Small perpendicular

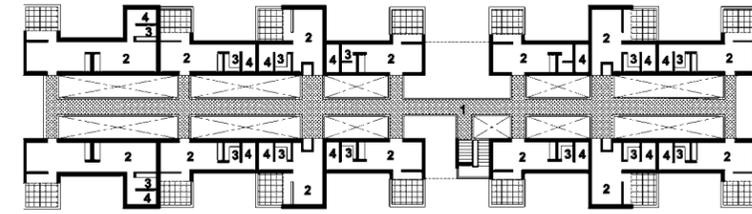
offshoots provide well-defined individual access to rooms on both sides. As a result, the relatively narrow six-metre wide space between the two rows of rooms has been divided into numerous small courtyards, which receive plenty of daylight and provide natural ventilation—an elaboration and variation of the original section of the Art College Hostel.

Right:
Terraces, *jalis* and integrated but open-to-air stair block helps define a crisp profile.

Below:
The terracing is nestled within the overall outline of the housing, setting up a play between the overall frame and the stepped profile of the building.

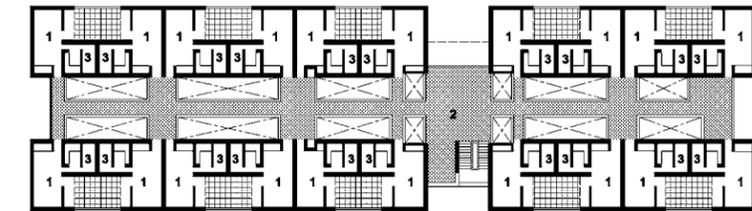


Second floor plan



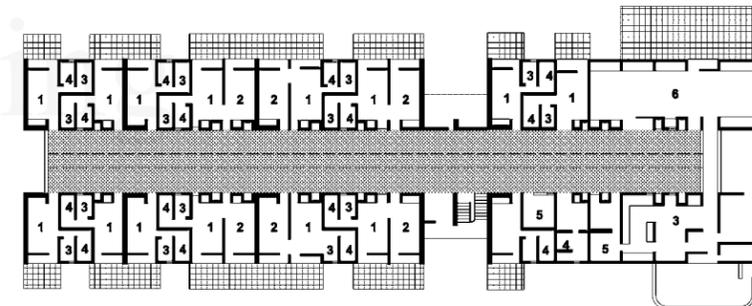
1. Central bridge
2. Bedroom
3. Kitchen
4. Toilet

First floor plan



1. Single room
2. Central bridge
3. Toilet

Ground floor plan



1. Bedroom
2. Living room
3. Kitchen
4. Toilet
5. Store
6. Lounge/Dining

Section

