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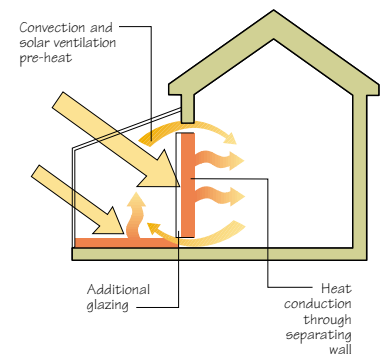
- **Orientation:** the direction a conservatory faces is not so critical as it is for other direct gain options, such as windows. The positioning of a conservatory depends on the layout of the house and which rooms it can best serve. A south-east aspect is ideal: the conservatory greets the early morning sun and therefore its benefits can be felt throughout the day. This also makes a wonderful place to have breakfast. Overheating of a south-east conservatory will be less of a problem as the house will shade it from the westerly sun at a time when the outside air temperature is at its warmest; and the high south summer sun will not be striking the roof at such a square angle.
- **Conservatory with mass wall:** adding a conservatory to an existing masonry-walled house creates a solar mass wall which works on the same principal as the Trombe Wall, but with the same defects. Further, the airspace between the glazing and the mass wall is now living space, with plants and people to consider. Interestingly, the Trombe Walls at a housing scheme in the Wirral, where the gap between glazing and wall was 600mm, were found to be more useful for growing tomatoes than for supplying heat to the house.
- **Conservatory with air heater:** mounted on the rear conservatory wall, a lightweight solar air heater with glazing and black or selective surface absorber can be connected, by ducts, either directly to the house, or to its own heat store. The air heater will have insulation material on its back face to prevent unwanted heat loss to the separating wall of the house. This wall will now be effectively insulated. As with the solar air heater, warm air simply circulates by



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Fig. 10.54 Glazed street at the Swansea Foyer project, which provides home and training for the young unemployed homeless. The street provides a buffer zone and useful sheltered space for casual interaction. Architect: PCKO Architects.

Fig. 10.55 Conservatory as entrance. This triple-glazed conservatory at the 'Centre of the Earth' in Birmingham acts as an entrance lobby and circulation space between the various function rooms. Using a conservatory in this way doesn't work very well in houses, but here, where the occupants are dressed in outdoor clothes, it is fine. Note the ceramic tiles for solar collection and storage. Architect: David Lea.

Fig. 10.56 Glazed street. Linking three buildings at this Family Centre, the conservatory saves energy and provides a low-cost circulation space where active infants can play safely in all weathers. Architect: Benedicte Foo.

Fig. 10.57 Indirect conduction – conservatory.