At least a nodding acquaintance with the major achievements of the European architectural traditions is part of every contemporary architect’s visual baggage. The essence as well as the details of the architectural language of the Pantheon, of Chartres or even Haussmann’s Paris form a storehouse of visual references and have been internalized to some degree at least. Only rarely do the achievements of the Islamic architectural traditions, the Selimiye, the complex of Sultan Hassan, and Cordoba take their place in the same storehouse. Even more rarely are their conceptual and formal aspects internalised.

In this column by Dr. Renata Holod MIMAR intends to present highlights of the great traditions of Islamic architecture: individual builders and their buildings, aspects of regional and period styles, or problems of a more conceptual nature. Through these small features, it is our hope that the achievements of the past can be an inspiration and sounding board for the designers of the present.

Madrasa Al-Ghiyasiyya

As a first feature I have chosen the less well-known group of ninth/fifteenth century buildings of the Shirazi group, built in the Timurid realms of present Iran, Afghanistan and Soviet Central Asia. These are crucial buildings for they served as models and inspiration for the subsequent builders of Mughal India, Safavid Iran and even, to a smaller extent, of Ottoman Turkey. But, even without these demonstrable influences, each building of the Shirazi atelier has that fine orchestration of proportions, that clarity of layout, that sureness of structure and elegance of decoration which places it among the best works of mankind.

The Shirazi school of the Timurid period began with the enforced transfer to Samarkand of building masters and technicians by Timur at the end of the fourteenth century. I can only reconstruct the barest details of these events. Yet, because of the major building programmes of Timur, his family and descendants and their courtiers, these Shirazi masters appear to have established a workshop tradition which functioned and developed for more than fifty years, incorporating both the old Shirazi usages as well as the local Central Asian ones. Buildings from this period numbers into the hundreds. (Lisa Golombek with Donald Wilber are completing a major study and catalogue of them to be ready for print within a year.) It is their atelier, however, which produced the major monuments of Timurid architecture and whose tone and style was widely imitated by more regionally based workshops.

I know little about the internal history of the Shirazi atelier. One personality does emerge, however, both from the contemporary biographies of notable men of the realm as well as from the builders’ inscriptions on the monuments. It is Qavam ad Din ibn Zayn ad-Din Shirazi who died in 842H/1438 AD. He was noted for his skills as an outstanding designer, engineer, and builder as well as astrologer and appears to have had a fairly influential position at the court of Timur’s son, Shahrukh. He worked directly for Shahrukh and, in particular, for his wife, Gawhar Shad. The great mosque of Gawhar Shad built in 821H/1418 AD in the shrine at Mashhad was the direct inspiration for the Masjid-i-Shah at Isfahan. The complex of mosque, madrasa and mausoleum of Gawhar Shad built between 820-842H/1417-1438 AD in Herat was the central focus of the fifteenth century city with its large walled plaza marked by corner minarets. The last building for which Qavam ad Din was responsible and which he did not see to completion is the exquisite Madrasa Al-Ghiyasiyya built between 842-848H/1438-1444 AD for a grand vizier. I am presenting it here because it is better.
Entrance elevation

Standing in the countryside, rather than in a compressed urban setting, the building has a finished and decorated exterior. It is a two story building with its rooms and halls organised around a court, a common enough type, particularly useful for residential colleges such as this was. But it is the arrangements of the rooms, the location of the stairs and proportions of the bays that make it special. The development of the corner (the problematic area of courtyard buildings) into self-contained 'apartments' is an inventive solution. Four  eyvans mark the cross axiality of the court facades. Yet there is a differentiation among the  eyvans, the most interesting providing additional air movement for the court as well as a cooler sitting area by incorporating a wind tower (badgir) in its back wall. While we know of the existence of the earlier wind towers through texts (undoubtedly, they were part of the repertoire of residential building for many centuries), the wind tower in this madrasa is the earliest dated monumental example.

Vaulting, and particularly the way in which crossing or transverse arches were
Far left: North-east chamber walls and dome.
Left: Court - close up of iwan.

used to bring light into interior, has been mentioned as the major achievement of Timurid architecture. In the Madrasa al-Ghiyasiyya, the dome over the northeast lecture hall displays the full vocabulary of these techniques with the special added feature of a central lantern built with a double shell. The finished dome over this hall would have been three shells, an outer tile cap (no longer standing or never completed) as well as the double inner shells.

The richness of geometric, epigraphic and floral designs on the mosaic tile and the composite tile and brick decoration would require a separate essay. Suffice it to say here that the inventiveness of the geometric patterns, the proportions of the individual letters and the delicately balanced colours of the floral motifs indicate that the Shirazi atelier worked closely with the major painters and calligraphics at court.

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