Aga Khan Historic Cities Programme

Urban Conservation and Area Development in Afghanistan

Aga Khan Trust For Culture

Cover photograph: Timur Shah Mausoleum, by Gary Otte, 2005

The west elevation of the Shahjahan Mosque prior to and during replacement (below) of the marble facing.

platform. Measuring some 4.5 metres square, the elevations of the reconstructed enclosure comprise a central arched opening flanked by pairs of marble lattice or *jali* screens. Now re-planted with *arghawan* trees, the area between the marble screen and the outer enclosure, where the grave of Babur's son, Hindal, survives, provides a tranquil space in which visitors can pay their respects.

The white marble mosque dedicated by Shahjahan during his visit to Babur's grave in 1647 is arguably the most important surviving Islamic monument in Kabul. The building retains a fine inlaid marble inscription in which reference is made to the site as *'this theatre of heaven, the light garden of the angel king'*. Historic photographs indicate that a number of other buildings were erected around the mosque during the reign of Amir Abdur Rahman Khan, when the structure was covered with a traditional earth roof, later replaced by a pitched roof of iron sheeting.

Around the same time, the original parapet of the mosque was removed and marble finials added. By the time the Italian Archaeological Mission began conservation in 1964, it was deemed necessary to erect a structure of reinforced concrete and brick, over which the marble facing was re-assembled. Subsequent lack of maintenance, together with direct war damage, resulted in corrosion of the reinforcement and leaching of salts from the concrete, affecting both the structural marble elements and facing.

Following a detailed survey, conservation of the mosque was initiated in 2003 with the removal of the modern roofing and laying of traditional lime concrete, and replacement of cracked marble structural elements. Missing sections of the parapet were replaced with original marble elements rediscovered elsewhere in the garden, and the *mihrab* wall was re-faced, using some of the original marble pieces which had been laid as paving around the mosque. Staining on the marble elevations was cleaned, and some graffiti removed, but surface damage sustained during the fighting in the 1990s has been left visible.

Left: A mason prepares a marble structural element as part of repairs to the war-damaged roof of the Shahjahan Mosque.

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INTRODUCTION

Cameron Rashti, Director, Aga Khan Historic Cities Programme

Involvement of the Aga Khan Historic Cities Programme (AKHCP) in the urban regeneration process in Afghanistan began in Kabul in 2002 and in Herat in 2004, as part of the Aga Khan Development Network's contribution to the wider process of recovery and development in the country. While half a decade is a relatively modest period in the timeline of such ancient urban settlements, it is perhaps apt that the Programme pauses if ever so briefly to take stock of how far our initiatives have come from their point of origin, and how the enabling measures agreed with the government of the Islamic Republic of Afghanistan and its key municipal agencies have contributed to what is an ongoing restorative process.

Urban regeneration in historic cities is perhaps one of the most intellectually and technically challenging enterprises that society as a whole and the urban planning community in particular can engage in, even under peacetime circumstances. Embarking on this multi-variable, multi-stakeholder and multi-phase process in a post-conflict situation such as Afghanistan has experienced in recent decades has been both a humbling and morally compelling mission. In the face of such wide-scale loss of urban housing, services and infrastructure – the basic elements of civic order – urban planning often can appear to be as much an act of faith as a technical undertaking.

Mediating between the global and the particular, the Historic Cities Programme has responded in Kabul and Herat, as elsewhere in its portfolio, with passion for the underlying cultural history of these historic environments and a sober sense of realism about present urban challenges. Sober because, while urban regeneration deals with the local, the causes of decay and failure are often, as seen here, regional, national and international as well. The underlying principle of the Programme's initial engagement, in the face of such collective suffering and urban destruction, has been that initial steps towards the urban regeneration of Kabul and Herat must tap the remaining vestiges and symbols of what were the cultural 'high points' of local achievement, using these as anchors in local area initiatives while engaging communities in a restorative planning and redevelopment process.

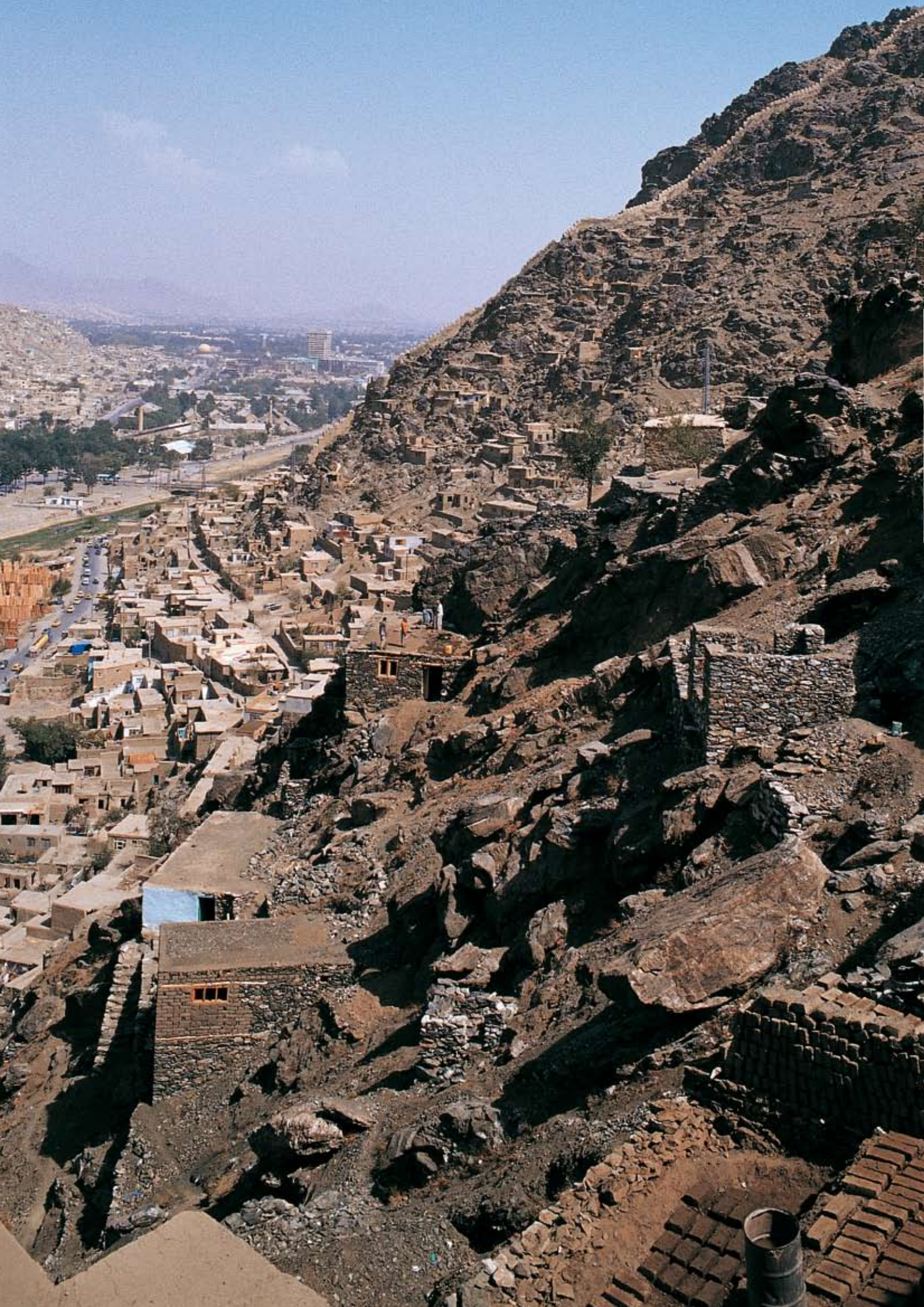
The programme selected three initial starting points for urban engagement in Kabul: the zone around and including the war-damaged Timur Shah Mausoleum, the historic residential district of Asheqan wa Arefan, and Baghe Babur, the garden retreat and ultimate resting place of the Mughal Emperor Babur. Since the early 16th century, this landmark garden has shaped Kabul in ways direct and indirect and left an urban landscape prototype that was to have lasting impact through continued refinement on the subcontinent. The three selected anchor points are significant as they have symbolically staked out a wider bound of territory pivotal to the urban identity of Kabul and served as poles around which its urban communities have coalesced and survived, transmitting their urban 'genetic code' through to the present day.

Historic Herat, instantly discernible from a nearly fully intact square intramural plan with cardo and decumanus, features an urban fabric in which the organic whole rules over individual structures. In Herat, the Programme has undertaken surveys and local area planning initiatives in the traditional quarters of the old city adjoining two historic cisterns currently being restored, and select remedial works for elements in the nearby Abdullah Ansari shrine at Guzargah, an historic complex and pilgrimage site to the city's northeast. In place for a shorter period, AKHCP initiatives in Herat have been shaped by the overriding objective to develop, with the Old City Commission, the institutional means to safeguard this historic city's main asset,

its spectacular visual and spatial integrity – weakened by the earlier periods of conflict and now ironically threatened increasingly by the larger, extramural forces of global capital and trade.

The following chapters provide detail on the Historic Cities Programme's technical assistance to the Kabul and Herat Old City Commissions as well as area planning, monument conservation and site interventions launched in both cities to date. The project's strength has depended on the intellectual and technical skills assembled within a team of dedicated and field-based urban and community planners, architects, historians, archaeologists, craftsmen, surveyors, and community and municipal representatives, working within painstakingly defined local initiatives on the understanding that only local actions, undertaken in co-ordination with local stakeholders, can have truly lasting impact. The work described in this brochure is testament to the dedication of this team who, together with the thousands of workers engaged on various sites, have braved regular security incidents and other adversities in the project's course. This publication also allows AKTC to acknowledge the very significant level of collaboration – technical and financial – on the part of its many development partners in these initiatives, described in the credits on page 70. This brochure will have gone beyond its original intent of stock-taking if a larger set of resources is subsequently brought to bear on the myriad areas requiring attention.

The urban regeneration and community redevelopment processes initiated to date are not to be considered 'finished product' in the common sense. Urban planning is not an enterprise that is ever 'completed' in the sense normally associated with discrete projects, and continuous attention is required to consolidate and stabilise hard-won results. Cities have historically survived through their civilising and practical functions and have evolved as those functions have changed. As shown poignantly below in the case of Afghanistan, irrespective of specific local physical expression and historical development, our urban heritage is inextricably bound to our culture and prosperity: we neglect it at our peril.



Urban Conservation in the Historic Neighbourhoods of Kabul

Habib Noori and Anna Soave

View of the Kabul bazaar in 1842 by Charles Atkinson.

One of the few areas with a surviving traditional urban fabric in the old city of Kabul, the neighbourhood of Asheqan wa Arefan and two adjacent quarters have since 2002 been the focus of various conservation, upgrading and planning initiatives implemented by the Historic Cities Programme of the Aga Khan Trust for Culture.

URBAN HISTORY OF KABUL OLD CITY

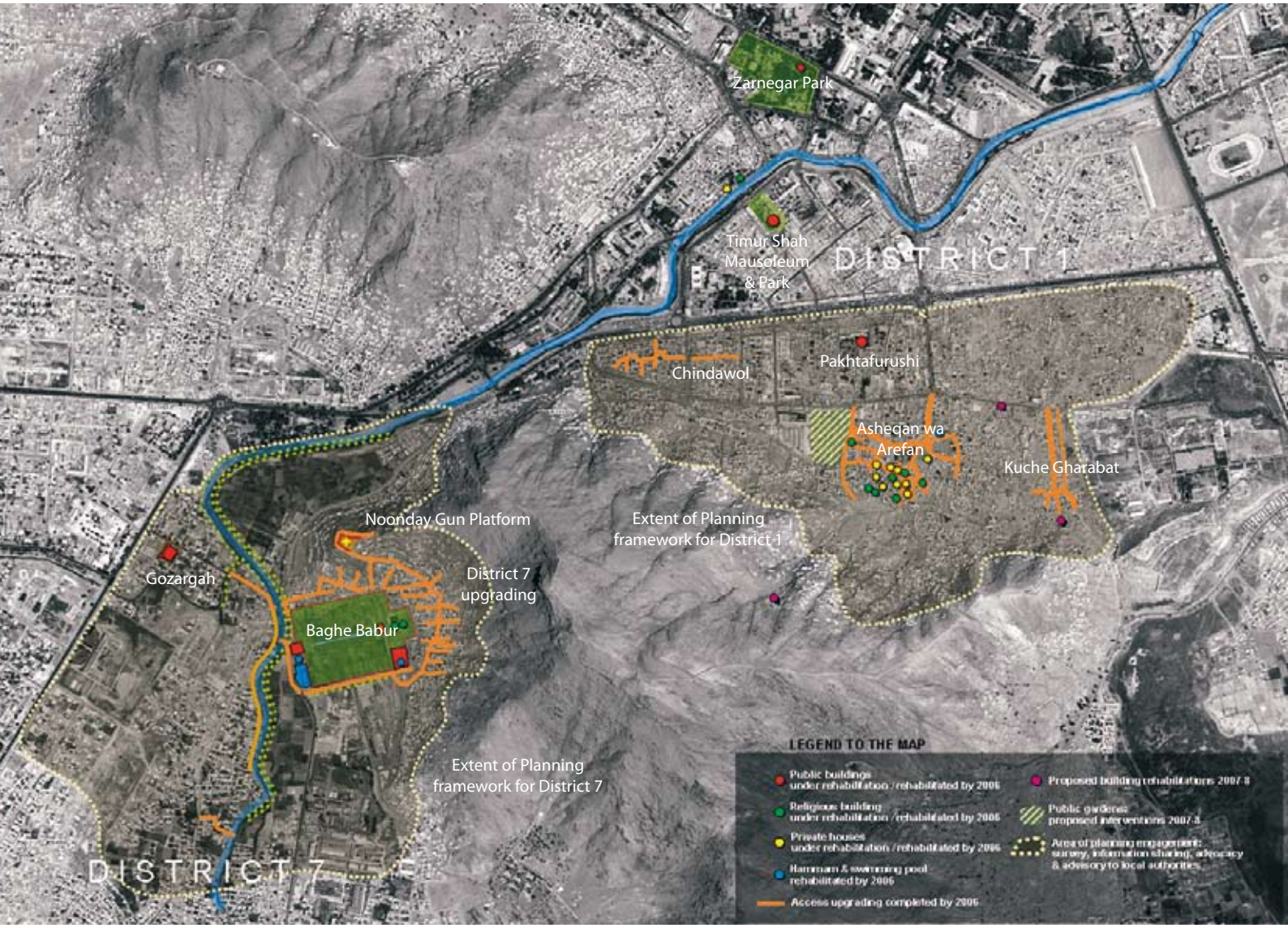
Even before most of the historic fabric of Kabul was laid waste during inter-factional fighting in 1992, the old city had long been in decline. Architectural remains confirm that a Buddhist settlement, first mentioned by Ptolemy in AD 150, existed in the area of present-day Kabul between the 1st and 5th century AD. The fortified citadel and walls along the ridge of Sher Darwaza mountain bear witness to the turbulent history of the city, control of which passed from Hindu to Muslim rulers in 871. At a time when other towns and cities in the region witnessed periods of significant architectural innovation, Kabul remained little more than an outpost during the Ghaznavid and Timurid dynasties.

After destruction by the Mongols in the 13th century, Kabul experienced something of a renaissance under the first Mughal emperor Babur, who laid out a number of gardens in and around the city. While the Mughal emperors were to be based in India, Kabul continued to flourish under their rule. In the mid-17th century an extensive covered bazaar, Char Chatta, was constructed by Shah Jahan's governor, Ali Mardan Khan, who also gave his name to a garden on the south bank of the Kabul River. By the late 18th century, when Timur Shah moved his capital from Qandahar to Kabul in the face of unrest following his succession, the city was home to some 60,000 inhabitants.

Accounts of travellers to Kabul during the 19th century describe a dense settlement of mud-walled homes, accessed through narrow alleys divided in parts into *mahallas* that could be closed off for defensive purposes. Apart from the citadel and homes of rich merchants, the bazaars seem to have been the main landmarks, along with a number of *serais* used by visiting traders.

It was the covered Char Chatta bazaar that was the target of a punitive raid on Kabul in 1842 by British troops, who returned in 1880 to destroy Bala Hissar, the historic citadel which had until then served as

Left page: Informal housing on the steep slopes of the Sher Darwaza mountain (along whose ridge runs the historic wall) with the city centre in the background.



Locations of site work undertaken by AKTC in the old city of Kabul 2003-2007.

the seat of power. This prompted Amir Abdur Rahman Khan to make plans for a new palace on the plain north of the Kabul River, outside of the confines of the old city. Kabul's population had by the late 19th century risen to around 150,000, and merchant families who had traditionally lived close to the bazaars also began to move out of the old city. Others followed as new suburbs were laid out from the 1920s to the south and the north-west.

While the historic centre retained its commercial importance for some time, many of the large merchant homes were subdivided, and fell into disrepair. As densities increased, living conditions deteriorated, prompting further movement out to the suburbs. A swathe was cut through the dense historic fabric in the late 1940s with the creation of the 'boulevard'

of Jade Maiwand through the heart of the old city, as part of efforts to modernise the capital. In response to anti-government unrest in the late 1970s, a residential area in Chindawol and part of the Shor bazaar area was punitively demolished in order to gain better access to the southern part of the old city, linking with Darwaza Lahori, the eastern gate.

At this time, as part of the utopian Master Plan for Kabul, government planners envisioned that the entire historic quarter should be redeveloped with multi-storey blocks between wide freeways running along the base of the Sher Darwaza mountain. The reality on the ground, however, was of a dense traditional fabric that differed little from that described by 19th-century travellers. By the time that the inhabitants fled their homes in the face of inter-factional fighting in 1992, the historic quarters of the old city were regarded by officials as little more than a slum.

It was into this 'slum' that the many families displaced by the conflict began to resettle after 1995, initially in western neighbourhoods that had seen less direct damage. To the east, most residential and commercial property had been reduced to rubble and sown with landmines which, along with unexploded ordnance, had to be cleared before families could salvage materials for use in re-building. Since then, war-damaged areas have witnessed an incremental process of residential reconstruction which, despite the intentions of official planners, largely follows the original pattern of settlement.

THE CURRENT URBAN CONTEXT

Having been at the margins of the urban development process for decades, the old city is now a critical component in the growth of central Kabul, as pressures on land and housing increase. With relatively little direct damage to homes, the neighbourhood of Asheqan wa Arefan is now home to some 10% of the inhabitants of the old city and, with more than 250 residents per hectare, is one of the most densely populated quarters. With a fragile stock of housing, much of which is subdivided, and a legacy of under-investment in services, living conditions are generally poor. Together with the neighbourhood of Chindawol, with a slightly lower residential density, and the severely damaged neighbourhood of Kuche Gharabat, where private reconstruction is proceeding apace, the area is currently home to just over 1% of the fast-growing population of Kabul.

Despite an official ban being imposed in 2002 on new construction in the old city pending the formulation of a rehabilitation plan, commercial redevelopment has proceeded along Jade Maiwand and other

View of war damage in 1993 around Pul e Kheshti Mosque, with ruins of the Char Chatta commercial area in the foreground.

Child peeks out from the Rambu house before restoration works began in 2003.

Families repairing and re-building their war-damaged homes in the old city.

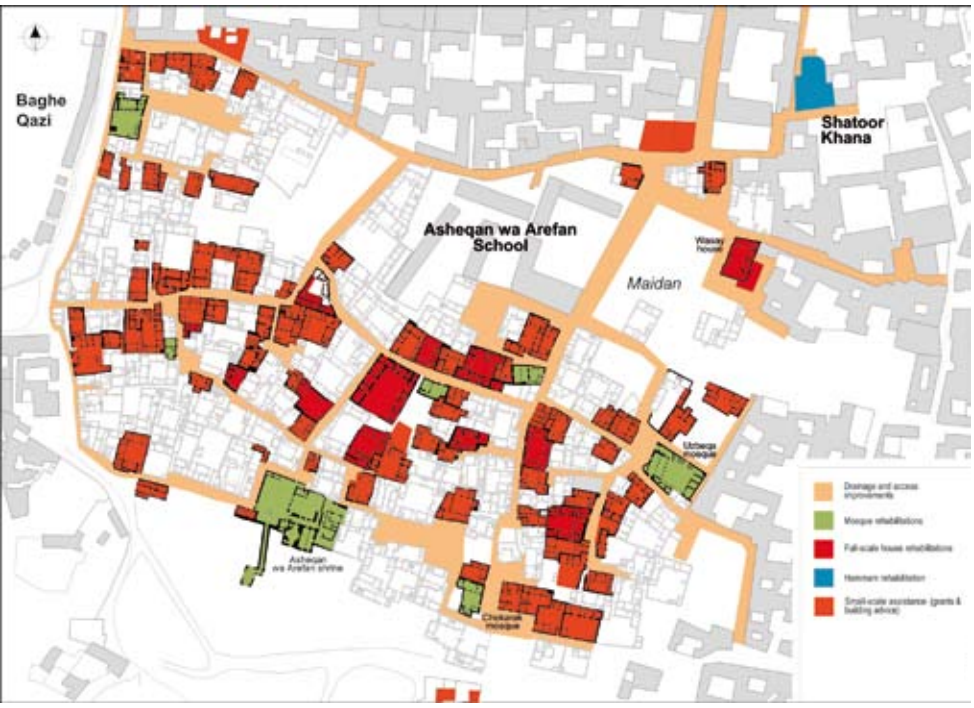
The Rambu house in Asheqan wa Arefan, before restoration.

main roads, while the reconstruction of traditional residential property has quietly continued inside many quarters and along the steep hillsides above the old city. With property values rising throughout the city, pressure to lift the ban has mounted from owners and developers. While officials who earlier advocated comprehensive redevelopment of the old city now accept the need for safeguarding of key areas (which has been enshrined in the draft Afghan national urban strategy), their institutions have limited capacity to undertake the analysis and negotiation required in the formulation of a workable rehabilitation plan.

The construction boom that Kabul has witnessed since 2003 continues to generate employment for those engaged in the many commercial construction sites in the city. In the old city, however, more than a quarter of residents are recent migrants, many of whom rely on casual employment in the adjacent bazaars which, at best, provides meagre and insecure wages. The subdivided homes of the old city are one of the few places in the centre where such migrants can find affordable rooms to rent. Whereas the bulk of new migrants had in the past built themselves basic homes in the informal settlements on vacant government land, usually on the steep hillsides that divide the city, this is now less accessible. Very few can afford to buy private residential land, and there are reportedly 25,000 applicants on the official waiting-list for official 'low cost' plots, only 2,000 of which have been released in the past two years. Rising prices have also forced families seeking affordable shelter to the outer margins of the city, where there has been negligible investment in public infrastructure and, with few opportunities for employment, many families now face impoverishment.

DOCUMENTATION AND PLANNING SUPPORT

It was in this context that AKTC embarked in 2002 on detailed documentation of the historic fabric in the residential neighbourhood of Asheqan wa Arefan, which has subsequently been the focus of a conservation and infrastructure upgrading initiative. Situated between Chindawol and the citadel, Asheqan wa Arefan takes it name from the graves of the grandsons of the renowned Herati poet, Khoja Abdullah Ansari. The graves of the elder grandson, Abdus Samad (*arefan*, the spiritually enlightened), and his brother Abdus Salam (*asheqan*, the lover) are to this day an important place of pilgrimage. Mapping and detailed surveys of key historic buildings and infrastructure took place, in parallel with consultations with the representatives of the 600 households then living in the quarter on rehabilitation priorities. In addition to conservation and upgrading measures, it was at this stage foreseen that area-plans for defined 'preservation zones' within



Site plan of the Asheqan wa Arefan quarter showing extent of work undertaken by AKTC 2002-2007.

Stone paving of alleyways and surface drains have improved access to homes in Asheqan wa Arefan.

the surviving quarters of the historic fabric might mitigate against uncontrolled development. This led to a later request to AKTC for technical support from the Ministry of Urban Development in order to facilitate the formulation of a planning framework for the neighbourhood of Chindawol, whose residential fabric is under increasing pressure from commercial development.

Building on the 'neighbourhood diagnostics' undertaken by AKTC in 2003-2004 in the Timur Shah area, a process of on-site surveys, followed by collation of baseline data and information from residents, community leaders and municipal staff, enabled an initial mapping of land-use, infrastructure and services. This was followed by a series of intensive participatory planning exercises with municipal staff and representatives from this highly organised community, leading to the identification of priority issues and needs over a five-year period. While well-received by both the Ministry and municipality, the failure of either to formally endorse the planning framework has limited its effectiveness as an instrument to guide – and control – development in the neighbourhood of Chindawol. While aware that the impact of this and other planning work is hostage to ongoing reforms in government institutions, which suffer from an acute lack of capacity, efforts will continue to ensure that such exercises are integrated into official plans for the old city, where appropriate.

The Uzbekha Mosque during conservation, which included replacement of sections of timber ceilings (middle) and cleaning of moulded plaster decoration (below).

In order to address the lack of planning capacity, direct support was extended by AKTC from 2004 in the establishment in the Ministry of Urban Development of an Historic Cities department, with a mandate to formulate a series of recovery plans for the old city. A series of joint data-collection and analysis exercises were undertaken with departmental staff, including an attempt to formulate a joint environmental action plan for the neighbourhood of Kuche Gharabat in early 2005. Since its establishment in late 2006, members of the Kabul Old City Commission, which has a mandate to oversee planning and rehabilitation activities, have been briefed on AKTC's ongoing initiatives in the old city. Based on its ongoing tracking of transformations in some neighbourhoods, municipal planning staff have shown an interest in undertaking joint area-planning exercises, as part of the next stage of AKTC's contribution to the recovery of the old city.

CONSERVATION OF HISTORIC PUBLIC BUILDINGS

In order to develop an understanding of traditional construction techniques, and to build trust within the resettling community, surveys were initiated by AKTC in the summer of 2002 on the Uzbekha community mosque that had suffered direct damage during the conflict. Probably dating from the late 19th century, this mosque in Asheqan wa Arefan follows a pattern typical to Kabul, with an upper summer prayer space (originally open to the east) with two rows of timber columns, above an enclosed winter mosque on the ground floor. As with other mosques in the old city, the courtyard is an important focus for the surrounding community, and a temporary workshop was set up in this space during the course of the conservation work.

At this stage, few local craftsmen were found to have experience in the decorative techniques used in the Uzbekha Mosque, so it was necessary to embark on intensive on-the-job training for plasterers and carpenters, among others. During the course of initial repairs to the timber roof, traces of intricate moulded plaster decoration were exposed on the walls, which had been covered by layers of modern plaster and oil-paint. The timber columns and arches supporting the roof were also cleaned of paint, exposing fine carved work from juniper, or *archa*, wood. Although a later modification, the glazed timber screen across the courtyard elevation of the mosque was re-instated to enable use of the upper space during the cold months. The traditional hypocaust *tabakhana* heating system under the ground floor of the winter mosque was also re-built, using flat stone plates laid over brick sleeper walls. During the reconstruction of collapsed rooms around the courtyard, the

water supply was improved and facilities for sanitation were installed. The Uzbekha Mosque was back in full use in early 2005, since which date four other community mosques in the area, Khoja Faqir, Sehdukan, Chukorak and Mullah Ghulam, have been documented and repaired, with the active participation of members of the community. In each case, handpumps have been installed on the all-important communal well in the courtyard, and facilities for ablutions upgraded.

Building on the experience gained during the conservation of the mosques, and using information from detailed surveys, work was initiated on the Asheqan wa Arefan shrine in late 2005. A modern concrete structure had been erected over the grave of Khoja Abdus Salam, which stands in the midst of a larger graveyard, and is accessed by means of a mosque-like timber portico, leading to a semi-underground corridor lined with fine lattice screens. Repairs were carried out to the roofs of these structures, which were found to be close to collapse, and a stone retaining wall built along the length of the corridor, to protect the timber

The courtyard elevation of the restored Uzbekha Mosque.

The restored entrance portico of the Asheqan wa Arefan shrine.

Deflection of the internal walls and timber screens (above) on the first floor of the Wasay house and props in place during stabilisation.

The interior of Wasay house with new and restored wood work.

screens, which were cleaned and repaired, along with the fine carved timber entrance door. During the course of repairs to the plaster, a series of decorated plaster niches were uncovered on the walls of the portico, and restored. The entire roof over the lower grave of Khoja Abdus Samad was re-built, and internal plaster and marble decoration restored. Extensive repairs were also carried out on the roof of the adjacent mosque, which dates from the early 20th century and retains fine decorated plasterwork on the *mihrab*. Work continues on the repair of the domed winter mosque beneath this, and on the landscaping of the shrine courtyard, which is an important focus both for pilgrims and residents of the neighbourhood.

One of the findings of baseline socio-economic surveys in Asheqan wa Arefan and adjacent neighbourhoods was the limited number of public facilities within the historic quarters. In order to address this situation, an agreement was secured by AKTC in 2005 for the reconstruction of the ruined Pakhtafurushi *madrasa* complex, with a view to it being re-used as an Early Childhood Centre by inhabitants of the surrounding area. The layout of the brick-domed *madrasa* will allow for a variety of sizes of classrooms and other spaces, ranged around a large central courtyard that is shaded by mature mulberry trees. In order to re-build the 52 domes, most of which had collapsed, a special production of fired bricks to match the originals, was required. Facilities for ablutions for those using the adjacent Pakhtafurushi Mosque, one of the largest in the old city, were also upgraded during the course of these works.

On a smaller scale, the rehabilitation of a traditional bath-house, or *hammam*, has provided residents of the Shuturkhana area, north of Asheqan wa Arefan, with an additional public facility. In an area where few resident families have access to adequate washing facilities in their homes, agreement was obtained from the owner for re-use of the ruined *hammam*, whose semi-underground structure was excavated and surveyed. The brick-masonry domes over both spaces were found to require only minor repairs, although the hypocaust system of heating under the floors had to be completely re-built, along with the adjacent fire-place or *atishkhana*, in which the water for the bath is heated over a large bronze vessel. Based on advice from operators of similar *hammams* in the old city, the capacity of storage of hot water was increased to meet anticipated contemporary needs. The rehabilitated *hammam* was re-opened in late 2006, and has been leased to a private operator, who currently serves some 150 male and female customers a day. Resources raised from the lease of the *hammam* are put towards the costs of upgrading community infrastructure.

CONSERVATION OF HISTORIC HOUSES IN THE OLD CITY

With many historic homes destroyed during fighting in 1992, the surviving residential fabric of Asheqan wa Arefan is particularly important to the history of urbanism and the rich building tradition of the region. As in other quarters of the old city, families of widely differing means have historically lived side by side, with no evident grouping of homes of the wealthy in a particular area (with the possible exception of the royal residences on Bala Hissar Pahin, below the historic citadel). In places where related families inhabited adjacent homes, sections of alleys had doors installed to enable them to be closed off for defensive reasons.

While there is an ingenious variety in the pattern of building, most traditional homes centre on a secluded courtyard, with summer quarters oriented to the north and a south-facing range for use in the winter. Many homes have half-basements used for storage, constructed of stone

Community meeting taking place on the first-floor space of the restored Wasay house and, below, the south side of the courtyard after restoration was completed in 2006.

Carpenters at work repairing timber lattice-work screens.

Courtyard of the Amin house during conservation works.

masonry, as are the foundations. Walls at the ground-floor level are mainly of mud-brick or monolithic earth, or *pakhsa*, while a timber-framed system of *sinj* with mud-brick infill is commonly used for the upper levels. Traditionally, the main courtyard elevations comprised carved timber shutters that could, according to the season and need, be raised vertically within a timber framed structure. While historic photos of other neighbourhoods show dwellings on three or more storeys above ground, most houses in Asheqan wa Arefan comprise two floors, with a half-basement. Flat roofs are supported on timber joists, and finished with a mud/straw finish, or *kahgel*. In the absence of written records, it is the decorative style of plaster or woodwork that provides clues to the age of a dwelling.

Based on initial surveys during 2003 of surviving historic homes in Asheqan wa Arefan, several were identified for possible conservation, based primarily on an assessment of their architectural value and vulnerability. The first intervention began in early 2004 on the house of Mohammed Amin, which retains a range of fine timber work dating from the turn of the century. Still inhabited by the son of Yasin Najjar, the carpenter who originally built it, the house is arranged on three levels, including the half-basement, around three sides of a courtyard. The first stage of work entailed jacking-up the timber-frame to correct the settlement that affected the stability of the structure. This was followed by repairs to load-bearing mud brickwork in the external walls, and replacement of mud-brick infill between the seismic-resistant *sinj* framing on upper levels. Moulded plaster and carved wooden decoration and ceilings were then carefully cleaned, and the sliding timber shutters, or *patai*, repaired.

As was the case in some other homes, conservation took place while the family was in residence, which provided an opportunity to record the oral history of the descendents of the carpenter/builder, as part of ongoing efforts to document the lives of inhabitants of the old city. Similarly to the conservation of public buildings, the work provided opportunities both for training of young Afghan professionals in documentation, site supervision and project management, but also for on-the-job training of masons and carpenters and their apprentices.

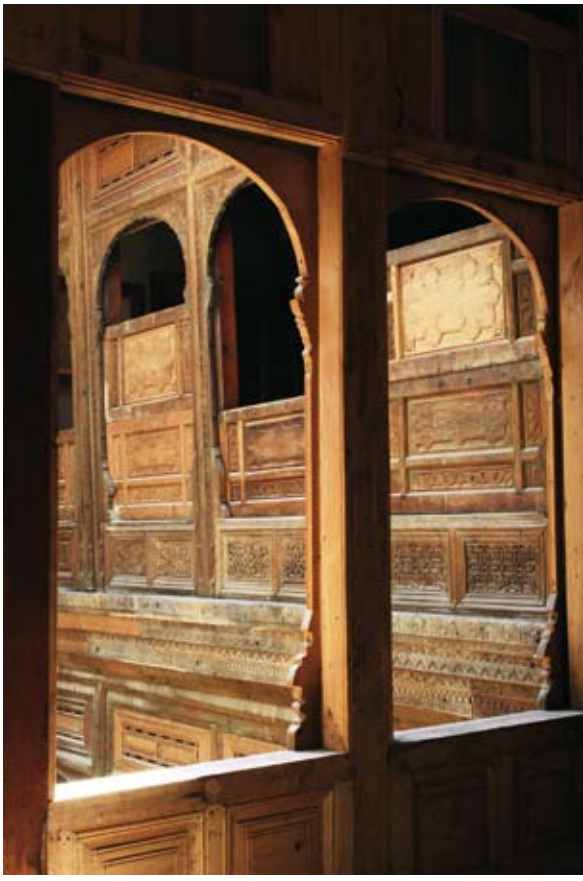
Building on the experience gained in the Amin house, work was initiated later in 2004 on the Wasay house, thought to date from the mid-19th century, and perhaps the oldest surviving house in the neighbourhood. Close to collapse when selected for conservation, only the south-facing range of the original courtyard complex has survived, but this retains some fine decorative timber lattice and plaster details on the main elevation and

inside the upper space. In order to house the family during the course of the conservation work, four single-storey rooms were built using traditional materials across the courtyard to the south, also serving as a demonstration of appropriate techniques for possible residential infill.

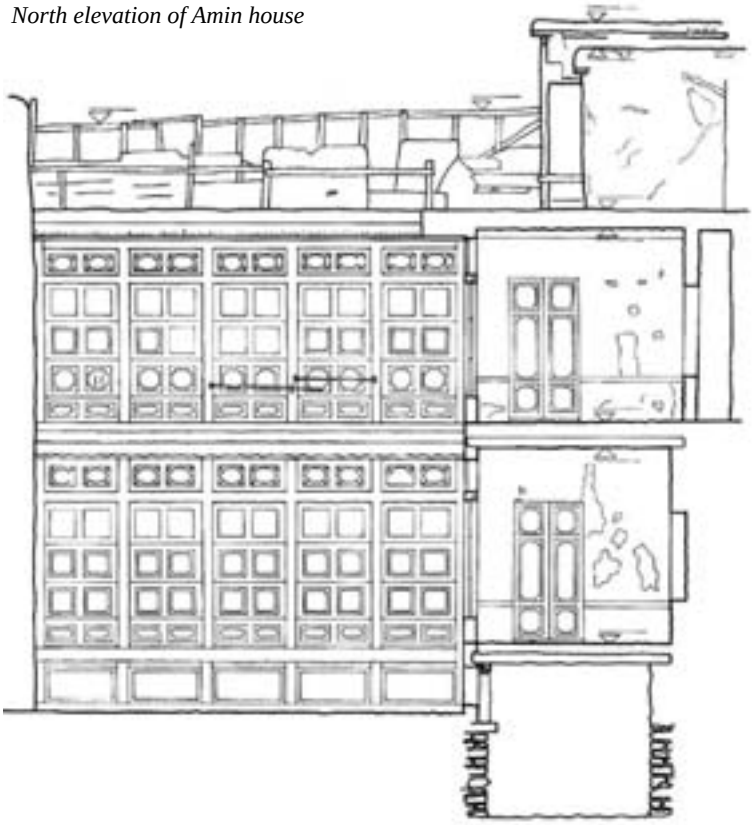
The availability of photographs of the Wasay house from the early 1990s enabled the AKTC team to identify elements that had been damaged or looted during the course of the subsequent conflict. The first task, however, was to remove layers of earth material from the roof, prior to temporary propping of the timber structure which, together with lattice screens, had undergone serious deflection due to the failure of a mud-brick gable wall. Once this wall was re-built, the timber frame was gradually jacked back in stages to something approaching its original position, to regain its stability. To limit damage to plaster decoration, sheets of soft waste foam were fixed over the walls during the course of this jacking. Once upright, excess plaster and whitewash was carefully removed by hand, exposing sections of fine moulded decoration. This enabled the reconstruction in the new west wall of a replica of the surviving decoration on the internal east elevation of this space. As with many homes of this era, a series of recessed niches, or *chinikhana* (used for the display of porcelain), can be found in the main

Interior of the restored Mohammed Amin house.

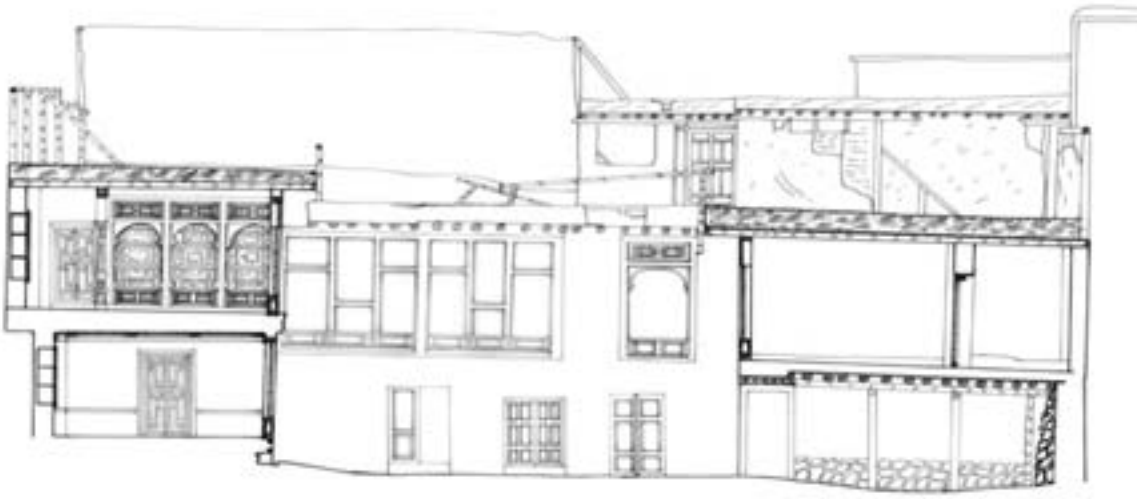
Restored timber screens around the courtyard of the Shekeba house.



North elevation of Amin house



Section of Shekiba house



Brick infill is removed from the timber structural frame during restoration of the Shekiba house.

reception space, or *memankhana*, which is divided by two lattice timber screens. Following the restoration of the internal plaster, work began on repairs to the sliding timber *patai* that make up the south elevation of the house. Damaged sections of carved woodwork were replaced in places, and new *patai* made from juniper, or *archa*, wood, as had been the case in the original. The most technically complex residential conservation undertaken to date by the AKTC team in Kabul, the restored Wasay house continues to attract attention from residents and visitors to Asheqan wa Arefan alike.

A total of seven other historic homes, representing a range of different forms and styles, have since been restored by AKTC in the Asheqan wa Arefan neighbourhood. These include the Shukoor house, whose owner was persuaded to stop building an inappropriate extension to an historic home. Support was provided for the construction with traditional materials of two rooms and a kitchen across the courtyard from the original house. The plan of the historic part of the Shukoor house demonstrates the ingenuity of traditional builders in adapting to a site that does not allow the usual north- and south-facing ranges. In this case, the main room faces east, with a timber screen giving on to a small internal space at the back. The only room in the first floor, which is accessed across the flat roof, retains the usual orientation to the north, for summer use.

Located close to the Sedukan Mosque to the east, the Rambu house is one of the few homes that retain timber *patai* screens on all four internal elevations. Arranged on two storeys, with a small secondary courtyard to the east, the Rambu house shows the evolution of decorative styles

from different periods, with the south-facing range perhaps being the oldest. Some unusual carved timber doors, which might date from an earlier house on the same site, were discovered during the course of the works, and restored. In the course of re-building the west range, it was possible to introduce new washing facilities for the occupants, who have stayed in the house throughout the rehabilitation works.

The introduction of improved services was also important in the conservation of the nearby Shekiba house, an example of a highly compact home that had family rooms on all four sides of a tiny courtyard. This was the first house in which the skills of AKTC's carpenters were tested in the reconstruction of an entire elevation of *patai* screens. Skilled joinery work was also important in producing replacement timber panels that had been looted from the Khaluddin house. Oriented to the north over the old city, the house has an unusual clerestory to gain light for the high-ceilinged internal reception space, which retains some fine plaster decoration.

Carpenter at work in the Ruhullah house during conservation and, below, the interior of one of the ground-floor reception rooms after restoration.

The removal of accumulated materials from alleyways in preparation for paving and laying of drain and water pumps has contributed to the improvement of living conditions for many families.

This documentation and conservation work has enabled a better understanding of the diversity of techniques employed in residential construction over the past 100 years or more. While the foundations of some homes might indeed be older, traditional mud-brick and timber frame homes in the old city have a limited life-span, and few of those surveyed seem to date from before the 1880s. This is borne out by comparative examination of photographs from the late 19th and mid-20th centuries, which suggests that many homes in the old city were replaced, using traditional techniques and similar plans, during this period. In most cases, homes seem to have been improved incrementally, in response to changing needs and fashions, and as the resources of owners allowed.

In addition to the physical restoration of important architectural heritage, this work has enabled the AKTC team to both deepen their understanding of traditional construction techniques and to develop the skills of a cadre of skilled craftsmen, who have in turn trained more than 50 apprentices who are now able to contribute significantly to joinery, masonry and plaster work. Together, these craftsmen represent an important resource for future restoration initiatives, and it is envisaged that support will in due course be provided for the establishment of a group of 'community contractors' to succeed the programme.

In parallel with conservation, a system of small household grants has been instituted to assist house-owners who had embarked on repairs, but might not otherwise be able to afford to complete such work. While making available essential materials and tools in 80 cases, on-site building advice has been offered to owners through this scheme. Aimed at ensuring that the surviving stock of traditional houses does not deteriorate further, and that living conditions (including facilities such as bathrooms) within homes are improved, the household grants have had a significant impact within the neighbourhood. It has, however, been important to take into account the high proportion of tenants, few of whom are willing or able to undertake repairs that risk encouraging owners to increase the rent of the property that they occupy.

UPGRADING OF BASIC INFRASTRUCTURE AND PUBLIC SPACES

Even with some historic homes and religious buildings restored, the condition of basic services and infrastructure in the old city could soon have rendered the surrounding neighbourhoods uninhabitable. Efforts have therefore been made to improve both access and drainage for the fast-growing population of Asheqan wa Arefan and adjacent neighbourhoods. With drains in a state of disrepair, domestic waste water flowed

down muddy streets to open sumps, which serve as evaporation ponds. As consumption of water rises, so does the need for effective disposal, since mud-walled homes are prone to damage from rising damp.

Having identified and mapped key environmental 'pressure points' in close consultation with residents, priorities were established for a range of labour-intensive initiatives that would have an immediate impact on living conditions. This has included removal of accumulated mud and waste from alleys and streets, often a metre or more deep, prior to laying of stone paving, which incorporates a system of surface channels leading from homes to repaired drains under the main streets. To date, nearly three kilometres of open drain have been laid using community labour in Asheqan wa Arefan, Chindawol and Kuche Gharabat neighbourhoods, while a similar length of underground drains has been repaired or built.

As part of these efforts to improve environmental conditions, domestic waste is now collected and delivered to municipal collection points, for onward disposal on landfill sites outside of the city. In a context where water is available from standpipes for only an hour or two a day, several communal shallow wells have been protected and hand-pumps installed. Together with the laying of over 13,000 metres square of stone paving, this has dramatically improved the environment in Asheqan wa Arefan and two adjoining neighbourhoods. In addition, the upgrading work has generated more than 50,000 workdays of employment among some of the poorest households in the city.

The various initiatives of AKTC in the old city of Kabul have required engagement at a variety of levels. Contributions continue to be made to urban policy formulation in the context of the ongoing Afghanistan National Development Strategy, while efforts have been made to promote effective urban governance among municipal staff. Participatory area-planning exercises have been conducted with a variety of stakeholders in parts of the old city, aimed at identifying critical issues and defining neighbourhood priorities. Important examples of architectural heritage have been restored, while owners of many traditional homes have been supported in undertaking repairs or upgrading their homes. A cadre of Afghan professionals and craftsmen has been trained in conservation and project management, as well as key traditional crafts. In all of these discussions and negotiations, it remains important to maintain a balance between conservation and development, basing our interventions on a sound understanding of the past, while allowing for new needs and opportunities to emerge, in response to the aspirations and resources of Afghan craftsmen and residents.

Drainage improvements are a priority for the inhabitants of Asheqan wa Arefan who are involved in all aspects of AKTC's work in the neighbourhood. Women are encouraged to participate in project discussion.

عمل بشنداس چهره نامی ننها

Rehabilitating the Garden of Babur and its Surroundings in Kabul

Ratish Nanda and Jolyon Leslie

A picture of Babur's grave (c.1915), taken by Oskar von Niedermayer.

The Garden of Babur (Baghe Babur) was laid out in the early 16th century by the emperor Zahiruddin Muhammad Babur Padshah Ghazi – the founder of the Mughal dynasty whose rule extended from Central Asia to India.

Babur ascended in 1494, at the age of 12, to the throne of the small principality of Fergana, in present-day Uzbekistan. He was the scion of distinguished families, descended from Timur on his father's side and the Mongol Chengiz Khan through his mother. Like his father, Babur set his sights on extending his rule over Timur's capital, Samarkand, which he managed to occupy briefly on three occasions before turning his attention to Kabul, which he captured in 1504.

The Legacy of Babur: History and the Environment

A detailed account of Babur's life and conquests is provided in his memoirs, the *Baburnama*, which provide a unique insight into the ideas of the founder of a dynasty that was to dominate the politics and culture of the region for 300 years. The memoirs also reveal the extent to which the natural landscape was central to the life of Babur's court, much of whose business was conducted in gardens that he visited or established on his various travels. The Timurid gardens that he mentions visiting in Samarkand and Herat clearly had a lasting impression, and probably influenced Babur's ideas about the sites that he identified soon after capturing Kabul. The garden now known as Baghe Babur was one such site, which was used by Babur to plan and launch military campaigns and celebrate victories, hold royal audiences, dispense punishments, read poetry and entertain.

Such was the significance of his favourite gardens that Babur continued to issue instructions during his campaigns in India to ensure that they were properly maintained. For example, his instructions about the upkeep of one garden were that *'saplings should be planted. It is necessary to make geometrical grass plots and plant flowers with nice colours and scents and greenery around the edges of the grass'*. In India, Babur adapted his ideas to the unfamiliar geography and climate, while making best use of limited sources of running water. The area along the banks of the Jumna River in Agra, where a series of gardens were set out during Babur's reign, came to be known as 'Kabul'.

Left page: Mughal miniature (c.1590) showing Babur supervising the construction of one of his gardens in Kabul.

Picture of Baghe Babur, c.1915, from the east, with Nadir Shah's fountains along the central axis, taken by Oskar von Niedermayer.

Picture of Babur's grave, at the far right, taken in 1880 by John Burke.

OUTLINE HISTORY OF BAGHE BABUR AND ITS TRANSFORMATION

It was back in Kabul, on a fold that had captivated him on the south-western slopes of the Sher Darwaza hills, that Babur set out what might be the 'avenue' garden he describes in the *Baburnama*. Situated above the fertile Chardehi plain, water was diverted to the site of the garden through a channel leading from the river to the south-east. Running water had long been a central element in formal gardens in the region, due in part to religious and symbolic associations with paradise, which might have also influenced Babur's wish to be laid to rest on this site. The layout of the garden included running water, flowers and fruit trees – most of the elements that came in time to be associated with later Mughal funerary gardens, such as those of Humayun, Akbar, Jahangir and Shahjahan.

His body having been transported from Agra, where he died, to Kabul, Babur was buried on an upper terrace of the garden in around 1540. His successors came to pay their respects to the grave, with Babur's

Charles Atkinson's coloured engraving of 1842 showing the central water channel and pools in Baghe Babur.

grandson, Akbar, visiting in 1581 and 1589, and his great-grandson, Jahangir, instructing during the course of a visit in 1607 that a platform, or *chabutra*, be laid around the grave, an inscribed headstone be erected and that the garden be enclosed by walls. Shahjahan dedicated a marble mosque during a visit to the site in 1647, when he also gave instructions for the construction of a gateway at the base of the garden.

The site subsequently seems to have fallen into disrepair, as Kabul's political and economic importance in the region waned. When Charles Masson visited the site in 1832 and prepared a drawing of Babur's grave enclosure, he noted that *'the tombs, for the truth must be told, are the objects of least attention in these degenerate days. No person superintends them, and great liberty has been taken with the stones employed in the enclosing walls…'.* Further damage was inflicted on the site during the severe earthquake that struck Kabul in 1842, when the perimeter walls reportedly collapsed. John Burke's photographs of 1880 show fragments of various marble grave enclosures scattered over the terraces, with the Shahjahan Mosque in a poor state of repair.

John Burke's picture of the Shahjahan Mosque in 1880.

Marble gravestones and fragments of grave enclosures found during the conservation work.

Wilhelm Rieck's picture of the Pavilion and Queen's Palace, c.1922.

As part of a wider programme of investments in Kabul, Amir Abdur Rahman Khan (1844-1901) re-built the perimeter walls and constructed a number of buildings for his court, thereby transforming an environment that had until then been defined largely by trees and water. The area around Babur's Grave platform was enclosed by an arcaded masonry enclosure and the level of the adjacent terrace was raised. Recent archaeological excavations revealed a system of water pipes supplying a series of fountains that were superimposed over the old central axis. Further transformations occurred in the 1930s, when Nadir Shah remodelled the central axis in a European style, with three fountains in stone pools. It was at this time that Baghe Babur was officially opened to the general public, and a large swimming-pool was constructed on the site of a graveyard immediately north of the Shahjahan Mosque.

Baghe Babur was much transformed and in a poor state of repair by the time that inter-factional fighting broke out in Kabul in 1992. The conflict quickly engulfed the area around the garden, which lay at the front-lines between factional fighters, who cut down trees to limit cover, stripped and set fire to buildings and looted the water pumps. Most inhabitants

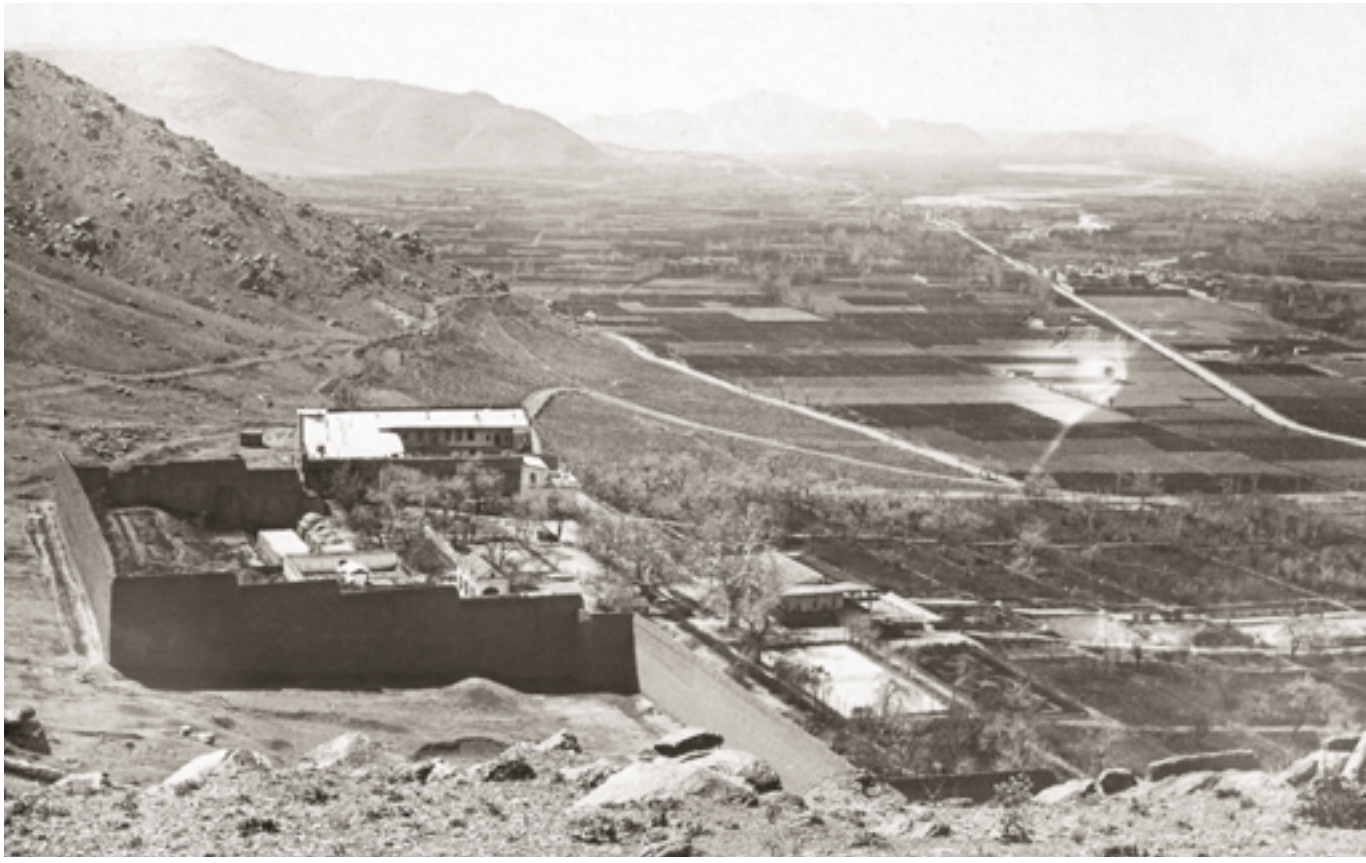
of the neighbourhood around the garden fled their homes. It was not until 1995 that mines and unexploded ordnance were cleared and water supplies to the area restored, enabling some re-planting to take place, under the auspices of UN-Habitat.

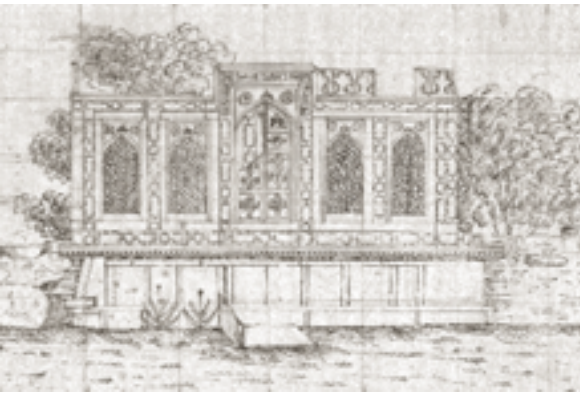
SCOPE OF WORK

In March 2002, the Aga Khan Trust for Culture (AKTC) signed a Memorandum of Agreement with the then Transitional Administration of Afghanistan for a comprehensive programme of rehabilitation of Baghe Babur. The project was to be carried out through the Trust's Historic Cities Programme (AKHCP), with co-funding from the Federal Foreign Office of Germany. The goal of the works has been to restore the original character of the landscape and conserve key buildings, while ensuring that the garden, which is the largest public open space in Kabul, continues to be a focus for recreation for inhabitants of the city. Significantly, the garden has remained fully open to the public throughout the course of the rehabilitation works, a fact that has been much appreciated by the residents of Kabul.

Babur's grave in 2002, prior to conservation works.

Wilhelm Rieck's picture of the upper terraces from the north of Kabul, c.1922.





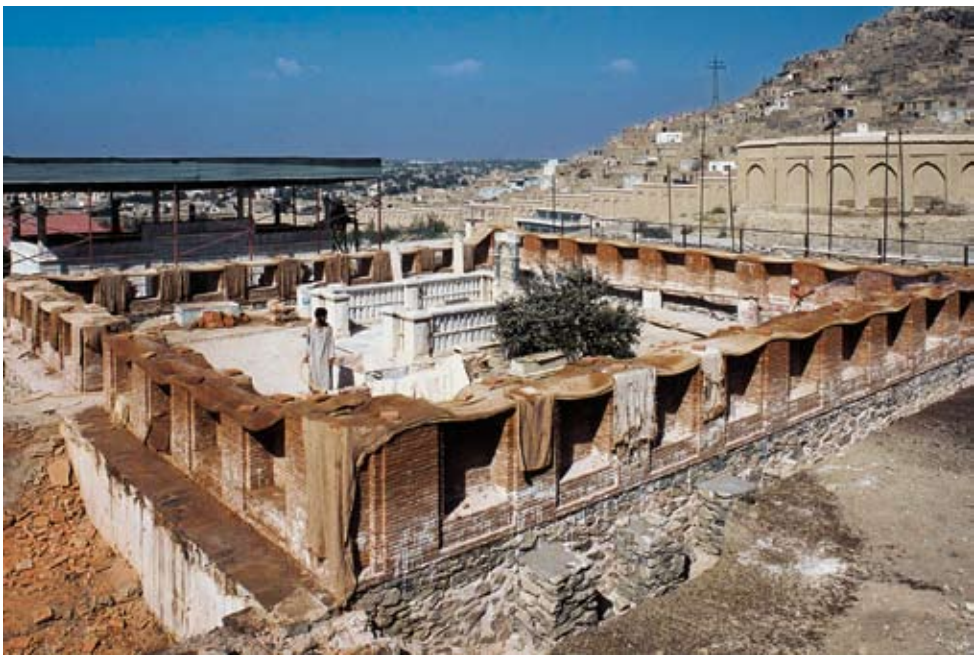
Charles Masson's 1832 drawing of Babur's grave enclosure.

Craftsmen finishing the marble jali *screens, and the completed marble inner enclosure. (See also picture, top page 24.)*

Baghe Babur currently comprises a walled area of just over 11 hectares, within which the principal historic structures are Babur's and other historic graves, a marble mosque dedicated in the 16th century by Shahjahan, a *haremserai*, or Queen's Palace, and a pavilion that date from the late 19th or early 20th century. In parallel with clearance of rubble and waste from the site, the initial focus during 2002-2003 was on surveys of the existing topography of the thirteen terraces of the garden and of key buildings.

CONSERVATION OF KEY ARCHITECTURAL ELEMENTS

Babur's grave has seen significant transformations since his body was brought from Agra for re-burial in Kabul, in accordance with his wishes. Apart from the carved headstone erected on the instructions of Jahangir in 1607 (which contains an elaborate chronogramme confirming the date of Babur's death in AH 937), few original elements of the grave seemed to have survived. The marble grave enclosure recorded in Masson's drawing had apparently collapsed by the time of Vigne's account of a visit to the garden, published in 1840, and Burke's photographs from the 1870s show fragments scattered over the grave terrace. Subsequent changes included the erection in the last years of the 19th century of an arcaded outer enclosure – subsequently demolished –



and the levelling of the southern end of the grave terrace in the 1930s, when the swimming-pool was built. In the ensuing years, Babur's headstone had been enclosed in a concrete frame, and the grave itself decorated with coloured marble and onyx and covered by a framed shelter.

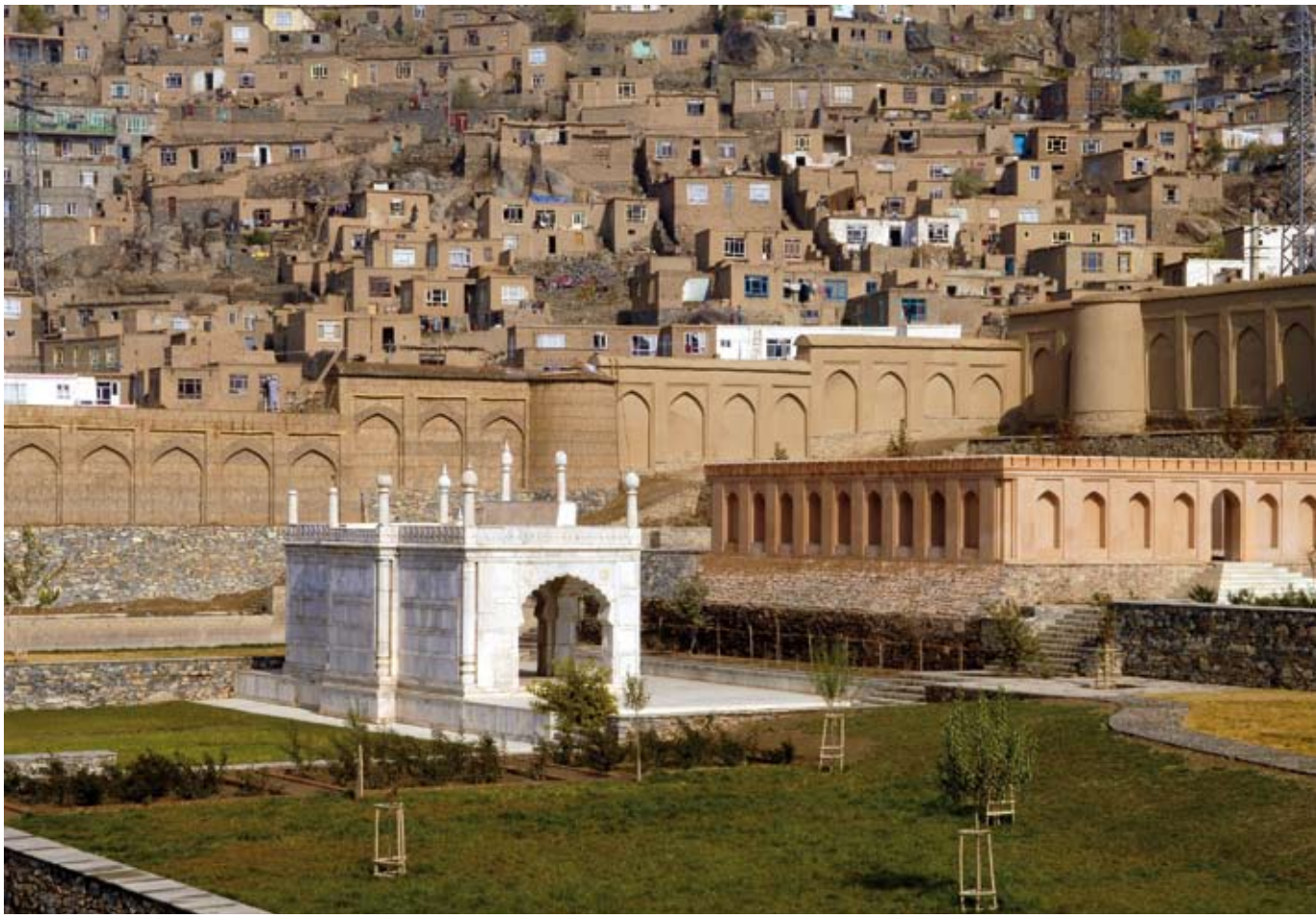
Based on archaeological excavations and a review of earlier documentation, the work undertaken since 2002 aimed to re-establish the original character of the grave area in a manner that conforms to international conservation practice. The level of the southern end of the terrace was lowered to restore the original elevation of the grave platform, around which the outer arcaded masonry enclosure has been reconstructed, on foundations of a 17-metre-square stone platform revealed by archaeological excavations, indicating that this had been built around and above older graves.

The 31 marble fragments found in the grave area yielded important evidence as to the style and workmanship of the original enclosure around Babur's grave. While it has long been held that the enclosure dates from the time of Shahjahan, the craftsmanship and motifs on the recently rediscovered fragments suggest that it might in fact date from soon after Babur's burial. Together with documentary material, the fragments have enabled the reconstruction of the enclosure, carved from Delhi marble, which has been erected *in situ* on the original grave

Above: Babur's gravestone within the reconstructed enclosure.

Below: The completed reconstruction from the north, with outer (brick) and inner (marble) enclosure.

Left page: The outer brick enclosure under reconstruction in 2005 on the original stone platform, which was rediscovered during archaeological excavations.



The restored Shahjahan Mosque and Babur's grave enclosure from the south, with informal housing on the hillside, behind the repaired perimeter walling.

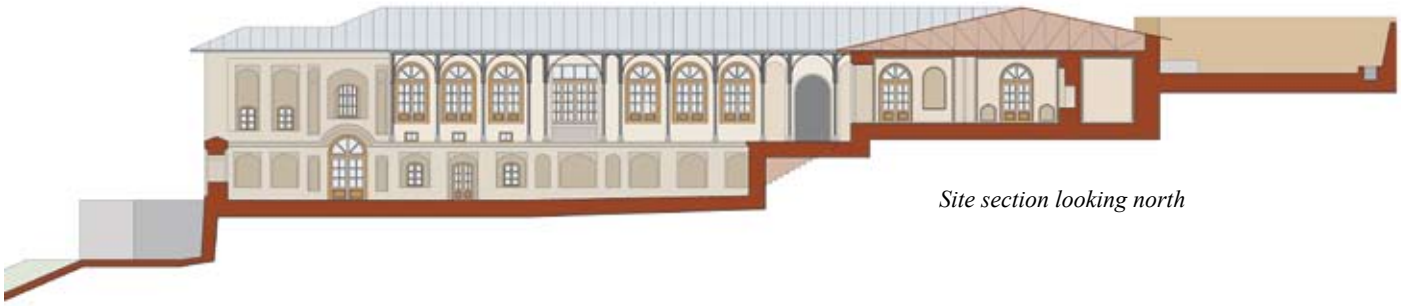
The Garden Pavilion, built at the turn of the century as a place for the royal family to entertain guests, partially covered a large square tank that is mentioned in accounts of Shahjahan's visit in 1638, and which also appears in 19th-century prints of the garden. Remnants of brick masonry beside the pavilion foundations suggest that a platform might have adjoined the tank. Used as a residence for an English physician to the court of Amir Abdul Rahman, the pavilion had fallen into disrepair by the 1970s.

Looted and burned during the factional fighting in 1992, initial repairs were made in 2003 by UN-Habitat and an Afghan organisation, DHSA (Development and Humanitarian Services for Afghanistan). The restoration of the pavilion was then completed by AKTC in 2005, and since then it has been used for a range of official functions and cultural events. Its re-use will be closely linked to that of the Queen's Palace, which stands nearby.

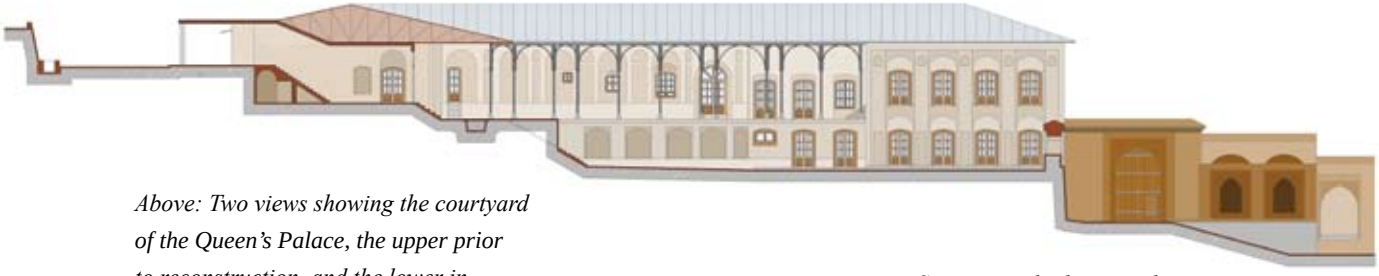
RECONSTRUCTING AND ADAPTING THE QUEEN'S PALACE

While Babur and his successors might have camped on platforms similar to that found beside the pavilion, the *haremserai*, or Queen's Palace, would appear to have been the first permanent residential structure in the garden. Built in the 1890s by Amir Abdur Rahman Khan in a local style permeated by European influences, the complex provided secluded quarters for the royal family around a central courtyard open to the west, offering sweeping views of the garden terraces below it and the plain of the Kabul River.

With the building occupying the south-eastern corner of the site, pedestrians and horse carriages entered across the upper terraces of the garden. Historic photos show other buildings linking the *haremserai* to the mosque and an adjacent *hammam*, but these were demolished during the reign of Nader Shah. Used as a residence for the German legation during the First World War, the *haremserai* subsequently served as a school and a military store. The complex was looted and burned during inter-factional fighting in 1992, and only the ruined walls were left standing, with traces of the original plaster decoration. Following



Site section looking north



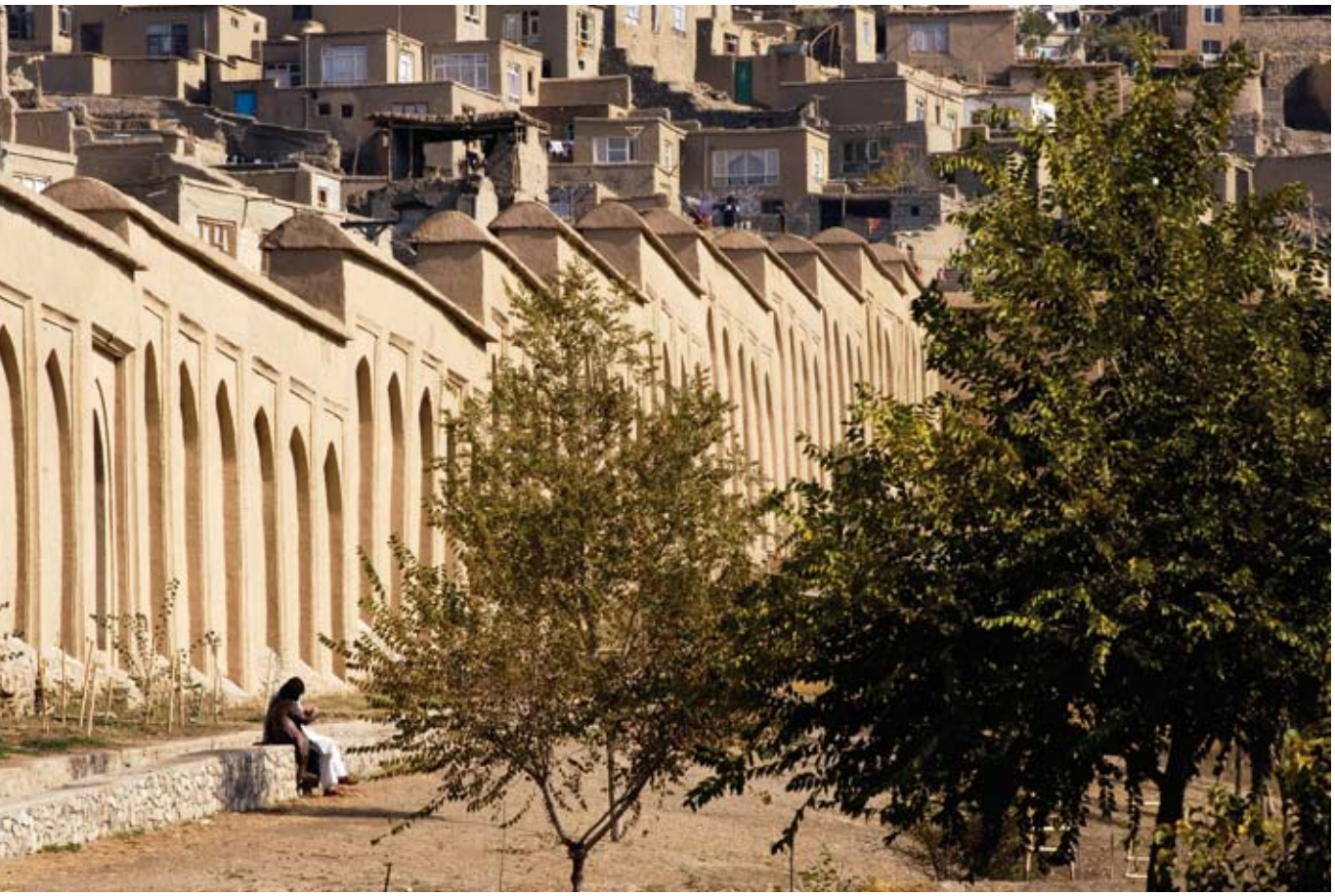
Site section looking south

Above: Two views showing the courtyard of the Queen's Palace, the upper prior to reconstruction, and the lower in 2006, during the course of the works, with a theatre performance going on.

the clearing of unexploded ordnance and mines, the collapsed sections of the *haremserai* roof were removed and the entire complex surveyed. One space to have escaped destruction was a brick-domed *hammam*, whose decorated plaster was restored in 2004. Following consolidation of the ruined structure in 2005, work began on the redevelopment design, based on the footprint of the original structure and referring to historic photographs.

Reconstruction work began in early 2006. While respecting the architecture of the original building, it has been possible to incorporate a range of alternative uses into the reconstructed complex and integrate new services. Moreover, this has provided an opportunity to develop the skills of a sizeable team of Afghan craftsmen in a range of building techniques, including brick vaulting, joinery, decorated plasterwork, marble flooring and stone carving. It is envisaged that the restored *haremserai* and its large courtyard will be a focus for public events, the revenue from which will be used to meet the costs of upkeep of the garden.

The northern verandah of the Queen's Palace nearing completion and, below, workers levelling the upper garden terraces prior to laying of turf.



Reconstructed northern perimeter wall, with informal settlement on the slopes above.

Reconstructing mud-brick arches between pakhsa *piers in the perimeter wall.*

RESTORING THE CHARACTER OF THE HISTORIC GARDEN

Although it is not clear how Babur defined the extent of his garden, the perimeter walls that now surround Baghe Babur follow the tradition of enclosure of formal Persian gardens. Jahangir's instruction in 1638 that walls be built around several gardens in Kabul probably included the site now known as Baghe Babur. The scale and alignment of these walls has doubtless changed, but surviving sections of *pakhsa*, compacted earth walling laid by hand, were surveyed in 2002. With many sections found to be close to collapse, nearly 1.5 kilometres of walling (parts of which are eight metres high and over two metres thick) were re-built or repaired in the traditional manner. An important secondary objective of this work was the generation of employment among displaced families who were then returning to their homes in the neighbourhood.

In order to understand the original nature of the landscape, six seasons of joint archaeological excavations were undertaken by the German

Plan of the restored Baghe Babur with its central axis, its planted terraces and its buildings and annexes.

1. Babur's Grave
2. Shahjahan Mosque
3. Garden Pavilion
4. Queen's Palace
5. Central axis water channel
6. Upper entrance
7. Caravanserai / lower entrance
8. Public swimming-pool

Archaeological Institute and the Afghan Institute of Archaeology. Architectural elements, from gravestones to parapets and waterfalls, were found to have been re-used at random throughout the garden, suggesting a subsequent disregard for their decorative or symbolic value. The archaeological excavations found items such as coins, glass, pottery, bones – and even remains of a crab in one of the lower tanks, thus shedding light on how the garden had been used down the ages.

Following archaeological excavations in Babur's grave precinct, in 2004 a marble-lined water channel (visible on late 19th-century photographs) was excavated west of the Shahjahani Mosque. Between this and the large octagonal tank excavated on the ninth terrace (now reconstructed) lay the ten-metre-square tank which is now partly covered by the veranda of the pavilion but whose shape is marked in the stone paving.

The dismantling of three 20th-century fountains enabled excavation to take place along the length of the central axis, where remains of eight rectangular tanks linked by channels, and sections of terracotta drainage pipe, as well as remains of stone retaining walls at the edges of terraces were found. In places, Mughal elements were found beneath more than 2.5 metres of deposits; they had been partly destroyed during the digging of a deep trench for pipes to supply the modern fountains. Fragments of three carved-marble waterfall elements of matching dimensions, which had been re-used as gravestones, were also discovered.

Above left: The central axis viewed from the east during rehabilitation, with the octagonal brick Mughal-era pool being excavated in the foreground, and Nader Shah's fountains, prior to their being dismantled.

The reconstructed octagonal pool and water channel along the central axis, with stone paving and initial re-planting under way in 2005.

Together, these finds have enabled the team to reconstruct the central axis and its main water channel, allowing water to flow again, as it did in Babur's time. This has been achieved without significantly disturbing the surviving archaeological remains, which were backfilled after thorough documentation.

In addition to the archaeological evidence, historic descriptions and images of the garden have been used to restore the character of the landscape that originally captivated Babur. The focus has been on the key elements in the original concept – planting, grading and the restoration of running water along the spine of the garden.

Underlying these works was the intention to provide the visitor with an exciting visual experience of the garden, as one progresses up through the site. Having passed through the lower entrance on the bank of the Chardehi River, and entered the courtyard of the new *caravanserai*, the visitor glimpses the ascending garden through an arched gate in the reconstructed stone wall of the Shahjahani gateway. Passing through

Workmen laying a stone pavement around one of the marble-edged tanks on the central axis and, below, the reconstructed octagonal pool on the ninth terrace.

this, it is possible to perceive the full extent of the orchard terraces of the garden, rising more than 20 metres up the hillside. On the outer edges of this lowest terrace, copses of walnuts and plane trees will provide areas of deep shade, as shown in 19th-century prints of the site.

The visitor proceeds up the garden by means of pathways and flights of stone stairs on either side of the central axis, along which water flows through a series of channels, waterfalls and pools. This central water-course is flanked by an avenue of plane trees, directing views up the spine of the garden towards the pavilion, and providing the deep shade that has long characterised the garden.

Each terrace along the central axis forms in itself a small garden, planted with pomegranates, roses and flowering bushes between areas of stone paving around a pool of water fed from the terrace above. From each level, there are views and access to the lateral orchard terraces, on which some several thousand trees have been planted. Babur's memoirs have provided an invaluable source of information on the trees that he planted in gardens in and around Kabul. Based on this description, areas closest to the central axis contain pomegranates, apricots, apples, cherries (the wild *alu balu* being Babur's particular favourite) and peaches, between which are small grassy meadows. Outside of the longitudinal paths that run parallel to the central axis, there is a denser planting of mulberry, apricot, fig and almond trees. At the outer edge of each terrace, copses of walnut trees have been planted along the perimeter walls, over which they will in time be visible from outside the garden.

While the original water-course along the central axis would probably have also irrigated the orchard terraces through secondary channels, a separate system of underground pipes has now been installed to reduce evaporative losses. Water is supplied by gravity from the upper reservoir, built by Nader Shah, through this piped system to small stone holding tanks which regulate the flow into open channels to the orchards.

At the head of the present central axis, a large octagonal tank (replicating the original that has been preserved underground) is surrounded by a copse of plane trees between which is an area of stone paving. From this level, there are views down the central avenue, and across the plain

Installation of one of the marble waterfalls, carved to dimensions of fragments found on the site, and water flowing down from the upper terraces.

of southern Kabul towards the Paghman mountains, just as those that Babur must himself have enjoyed. The modern swimming-pool that had encroached upon the terrace north of the pavilion was removed, and a new facility was built outside of the garden enclosure, near the lower entrance from the city.

On the level above the pavilion, the marble-clad western wall of the Shahjahani Mosque represents an important visual element, as do the re-built dry-stone retaining walls that run across the width of this part of the garden. Cypresses have been introduced to the north of the mosque, while planes and indigenous roses have been re-planted alongside the dry trunks of the massive trees that once provided shade at this level.

With the original level of Babur's grave terrace restored, the platform is now approached by stairs leading up from a formal flower garden to the south, surrounded by a circle of *alu balu* cherries. Between the outer and inner grave enclosures are *arghawan*, or Judas trees, while plane trees have been planted around the outer enclosure and along the terrace

The pavilion above the restored central axis, looking east, in the first year of planting.

The garden terraces are once again a popular place for family picnics.

The new caravanserai *complex uses traditional brick-masonry techniques. Below, the building near completion.*

above, where they provide shade around the grave of Ruqayya Sultana Begum, against a backdrop of the towering perimeter walls.

SUSTAINABILITY ISSUES

Conceived of as royal property, the fortunes of Baghe Babur until the mid-20th century depended on investments made by Afghanistan's rulers. After the era of royal patronage, when the site became a public park, its gradual degradation bears out the challenge of meeting the costs of its upkeep from public funds. While entry charges continued to be levied by the municipality for the garden and the public swimming-pool, this revenue barely covered the wages of the gardeners, let alone the costs of maintenance of the monuments and landscape. In order to ensure that the future operation of Baghe Babur is sustainable, it will be vital to identify appropriate ways of raising adequate revenue from its various facilities. In addition to funds generated through entry charges and use of the new swimming-pool, the restored pavilion, the new *caravanserai* and

the reconstructed *haremserai* all offer opportunities for rental for suitable cultural and social functions. Based on a conservative projection of returns from all facilities, it is foreseen that the garden could, with effective management, be self-sustaining after three years of full-scale operation.

RECONSTRUCTING THE *CARAVANSERAI*

Photographs of the garden from around 1915 show a double-storey *caravanserai* structure around a courtyard at the base of the garden. Although there was no trace of this above ground, excavations in 2003 revealed the foundations of earlier structures and water channels. Traces of extensive stone footings, aligned with the central axis of the garden, were subsequently discovered and seem to correspond to the gateway *'adorned with gilded cupolas, befitting that place'* which, according to the account in the *Padshahnama*, was commissioned by Shahjahan.

The same passage of the *Padshahnama* refers to a building in which the destitute and poor should *'eat their food in those cells sheltered from the hardships of snow and rain'*. This was the inspiration for a new *caravanserai* complex that houses the range of modern facilities required for contemporary visitors to Baghe Babur. Located at the bottom of the garden, the *caravanserai* building now serves as the main entrance for visitors coming from the city side. Drawing on traditional built forms and local brick-masonry techniques, it houses an exhibition and information centre, offices, commercial outlets and public facilities.

AREA DEVELOPMENT INITIATIVES

In his memoirs, Babur describes how he would hunt in the forests that extended from below Kohe Darwaza across to Paghman to the west. Early 20th-century photographs of this plain show scattered clusters of traditional housing between market gardens, which were an important source of produce for the inhabitants of Kabul city which, until then, was largely confined within walled settlements further north, along the banks of the Kabul River. The transformation of the environment below Baghe Babur began with the development in the 1920s of a new administrative centre in Darulaman to the south-west. In time, the fields between Darulaman and the centre of Kabul gave way to suburbs emerging between the traditional villages that had long dotted the plain.

Areas such as these grew significantly during the 1980s, as families fleeing war-affected villages settled in the relative security of Kabul, where they had a chance of finding employment. For those unable to

The new public swimming-pool adjacent to the caravanserai*, which replaced the old swimming-pool that had encroached upon the garden. Below, a stone construction detail of the facilities.*

Newly built storm-water drain with pathways in the informal settlement on the slope above Baghe Babur.

Efforts have been made to improve access to safe water for the community living around the garden.

afford homes in established settlements, the only option was to build shelter on the hillsides that separate the different sectors of Kabul. By the early 1990s, the steep, rocky slopes above Baghe Babur were densely settled with homes, the bulk of which were built using traditional techniques of stone masonry and mud bricks, with flat roofs. The lives of those living in these homes, however, were disrupted by inter-factional fighting in 1992, resulting in widespread displacement and destruction of property and infrastructure. By 1994, families gradually began to return to the ruins of their homes, to clear mines and ordnance, and to embark on reconstruction. Within five years, not only had most of the original residents around Baghe Babur re-occupied their reconstructed homes, but settlement had resumed higher up the slopes on illegally occupied government land, as demand for affordable housing grew with the influx of refugees and rural migrants.

This is the context of an Area Development Project, initiated in early 2004, which aims at improving living conditions for the 10,000 or so people living in the immediate vicinity of Baghe Babur. Consultations were held with community representatives to identify priorities, on which basis investments have been made on improvements of storm water drainage, water supplies and access. This has, over the past year, been matched by widespread private investments in housing repairs and extensions, even by owners who have no legal title to the land on which they have built. The continuing construction of homes on perilously steep hillsides, however, has put additional pressure on the rudimentary infrastructure, and increased risks to public health.

In parallel with the upgrading work, mapping and baseline surveys have been conducted in a wider area, extending over five *gozars* or sub-districts, currently inhabited by some 28,000 people. Although there are wide variations between the living conditions in the different *gozars*, these surveys reveal acute levels of overcrowding, with three-quarters of families inhabiting only one or two rooms, and precarious livelihoods, with a quarter of able-bodied men relying on intermittent, casual labour. Access to basic services is limited, with nine out of ten families living in the plain being dependent on unsafe water from shallow wells and having very limited access to sanitation. The data provided by the baseline surveys, together with the mapping of the physical environment, has been used in a series of participatory initiatives aimed at identifying and analysing key 'pressure points' in the area. Involving residents, community representatives and municipal staff, this process has led to the formulation of a series of Plans of Action. An important aspect of this work has been to build the capacity of key municipal staff at the district level, so that they might be in a better position to analyse

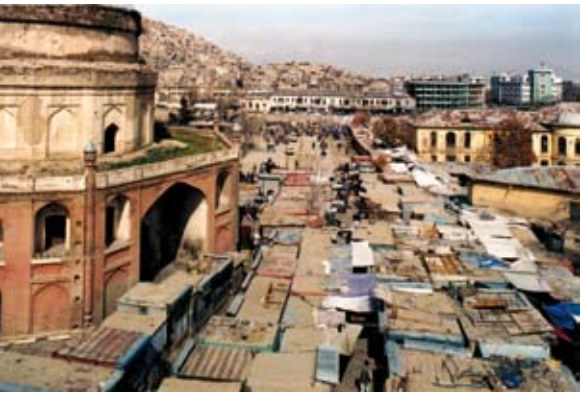
the situation and oversee current and future upgrading initiatives. It is envisaged that the Area Development Plan might not only leverage funding for upgrading on a larger scale, but also guide a broader process of physical, economic and social recovery in these *gozars*, while contributing to more effective urban governance.

While ensuring that the historic landscape and buildings are safeguarded for future generations, the Baghe Babur rehabilitation programme has fostered a better understanding of the needs of present inhabitants. Investments in conservation and rehabilitation continue to attract Afghan and international visitors to the garden, and have generated significant employment among the neighbouring communities, whose own investments in self-built housing have been enhanced by infrastructure upgrading. In adopting an inclusive approach towards both the conservation and planning work, efforts have been made to foster appropriate development in this highly sensitive environment. Many visitors to Baghe Babur remark on how the site represents for them a symbol of cultural recovery in Afghanistan. The challenge continues to be to find a balance between the symbolic and the actual, to retain the unique character of the landscape and monuments while ensuring access to the public for recreation and education and contributing to the recovery of the wider area around the garden.

A planning meeting, involving municipal officials and community representatives, in the pavilion.

Conservation of the Timur Shah Mausoleum in Kabul and the Upgrading of its Urban Setting

Abdul Wasay Najimi and Ajmal Maiwandi



The Mausoleum of Timur Shah in 2002, surrounded by temporary shops occupying the former garden space. In the background, the historic Andarabi quarter on the hill.

Left page: Interior space of the restored Mausoleum of Timur Shah in 2005.

One of the largest surviving Islamic monuments in central Kabul, the Mausoleum of Timur Shah is not only an impressive example of brick funerary architecture, but also plays a significant role in the history of the modern Afghan state and the development of its capital. The conservation of the mausoleums as well as a coherent redevelopment plan for the surrounding areas represent a contribution to the recovery of an historic urban quarter of Kabul that is currently undergoing heavy development pressures and rapid transformation.

TIMUR SHAH AND THE SADOZAI DYNASTY

Timur Shah was the second son of Ahmad Shah Durrani of the Sadozai tribe of Qandahar, who effectively united the territory now known as Afghanistan, having been elected in 1747 by an assembly of Pashtun chiefs to be their leader. Originally a general in the service of the Persian ruler Nader Shah Afshar, for whom he conducted military campaigns into India, Ahmad Shah consolidated his rule over the turbulent new state of Afghanistan before his death in 1772. His son, Timur Shah, was born in 1746, probably in Herat, where he served as governor before succeeding to the throne. Having faced off a military challenge from an elder brother who was by-passed in the succession, Timur Shah moved his capital from Qandahar to Kabul, which lay at the centre of his domain and was the crossroads of Pashtun and Persian languages and culture.

Timur Shah's reign was dominated by continuing turbulence between the fractious tribes of the new Afghanistan. He died in Laghman in 1793 and his fifth son, Zaman Shah, who had served as governor of Kabul, inherited the throne at the age of 23. Zaman Shah chose not to bury his father in the traditional graveyards east of the citadel, and around 1817 initiated the construction of a brick mausoleum in a *châhâr bagh* or garden on the eastern bank of the Kabul River. Progress on the construction of the mausoleum seems to have been intermittent, due in part to continuing rivalries between the male lines of the Durrani family.

During a visit to Kabul in 1839, the British traveller James Aktinson noted that *'the tomb of Tymmoor Shah ... is still unfinished; it is a mere shell, built of burnt brick unplastered, and without minarets or embellishment of any kind... The walls and cupola bear innumerable marks of cannon-balls and shot, produced in the several insurrections that have occurred at Caubul since it was erected'.*

John Burke's photograph of mausoleum from the east within its châhâr bagh *in 1880.*

THE *CHÂHÂR BAGH* IN THE CONTEXT OF KABUL'S DEVELOPMENT

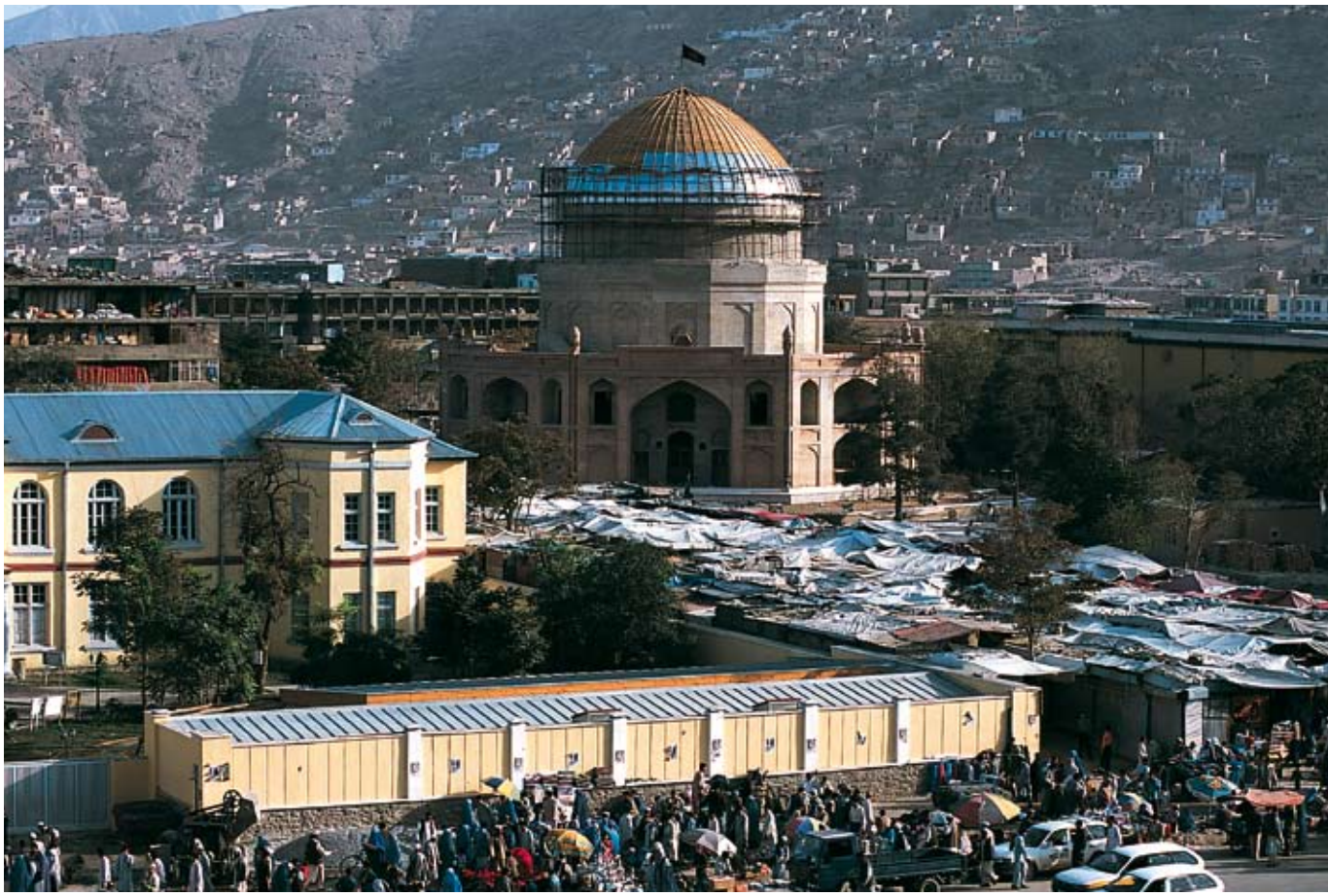
The transfer of the court from Qandahar to Kabul meant that space had to be found for royal functions within the walled enclosure of the citadel, or *bala hisar*, which served at that time as the principal residential quarter for the elite and merchant classes of Kabul. As the population of the capital increased, the walled residential settlements that had been established to the west expanded and in time merged into a larger metropolis along the south bank of the Kabul River. The re-location in the mid-19th century of the royal quarters from the *bala hisar* to a new site north of the river had a further impact on these gardens, some of which were incorporated into the new compound.

Photographs from the late 19th century show that the *châhâr bagh* in which the Mausoleum of Timur Shah stood was by then much reduced in extent. In 1904, as part of efforts to modernise the capital, Habibullah Khan constructed a large secondary school, the first in the country, on land to the north-east of the mausoleum. The Habibia college formed part of a range of neo-classical buildings that stretched in time along both banks of the Kabul River. Although it is not clear that this was

the intention, this range of buildings effectively screened the traditional residential quarters of Shah do Shamshara to the south, and the area between Jui Sher and the west bank of the river. In 1965, a section of this range was demolished and a municipal park created between the Mausoleum of Timur Shah and the river.

This happened after the transformation of the area to the south of the Mausoleum of Timur Shah, when the commercial boulevard of Jade Maiwand was cut through the heart of the old city in the 1940s. The opening-up of part of the historic network of alleyways to vehicular traffic encouraged the construction of multi-storey commercial depots, which replaced the traditional sprawling bazaars and *godowns* that once characterised this part of the old city. In time, the historic homes of the Shah do Shamshara neighbourhood to the west of the mausoleum were also transformed into workshops or depots. Two single-storey bazaars, selling dried fruit and pulses, are all that remains today of the traditional commercial fabric of the old city.

Informal commercial activity occupying the original municipal park and, below, the mausoleum in its urban setting from the north-west, with Aisha Durrani (formerly Habibia) school to the left.



Interior of the mausoleum during restoration, showing the ribbed inner dome, built in brick.

TIMUR SHAH'S MAUSOLEUM AND THE AFGHAN FUNERARY BUILDING TRADITION

Mausoleums for spiritual and military/political leaders are an important part of the architectural heritage of the region, and in many cases were the largest and most permanent structures within settlements at the time. Such buildings were not only expressions of power or piety, but also strove to demonstrate the cultural achievements of those who sponsored them, through the use of the best of contemporary craftsmen.

In commissioning a mausoleum in memory of his father, Zaman Shah drew on the Central Asian tradition of mausoleums set in formal gardens, as later continued by the Mughals and their successors. Among the early examples are the 11th-century brick-domed mausoleum in Ghazni, erected for Sultan Mahmood in one of his favourite gardens in the city that was his capital, and the 15th-century mausoleum of Gawarshad, outside Herat. The exquisite glazed tiles and elaborate calligraphic decoration around the dome of the mausoleum of Gawarshad – a part of the *madrasa* complex that she dedicated in 1447 and that was destroyed in a British raid in 1883 – demonstrate how important the visibility of funerary structures came to be.

A more direct architectural comparison might, however, be drawn between Timur Shah's Mausoleum in Kabul and the one that he built for his own father, Ahmad Shah Durrani, in Qandahar. Similar in plan and section, the elaborate internal stucco and painted decoration of Ahmad Shah's Mausoleum gives an idea of the possible intentions of Zaman Shah for his father's mausoleum, had it been completed as planned. Further stylistic similarities exist in the mausoleum that Nader Shah built in the early 20th century over the grave, near Qandahar, of Mirwais Hotak, who declared Qandahar's independence from Persian rule in 1709. The style of the facing brick elevations and the decorated parapets on Timur Shah's Mausoleum suggest that alterations were made to the monument in Kabul around this time.

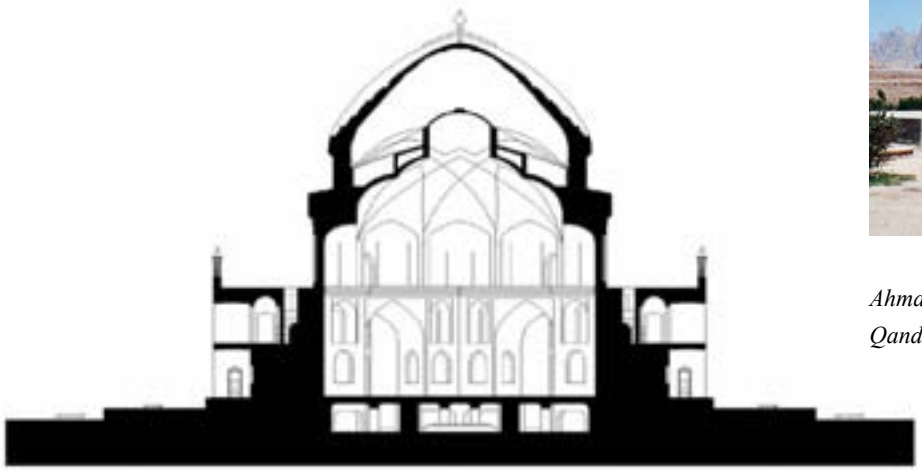
THE ARCHITECTURE OF TIMUR SHAH'S MAUSOLEUM

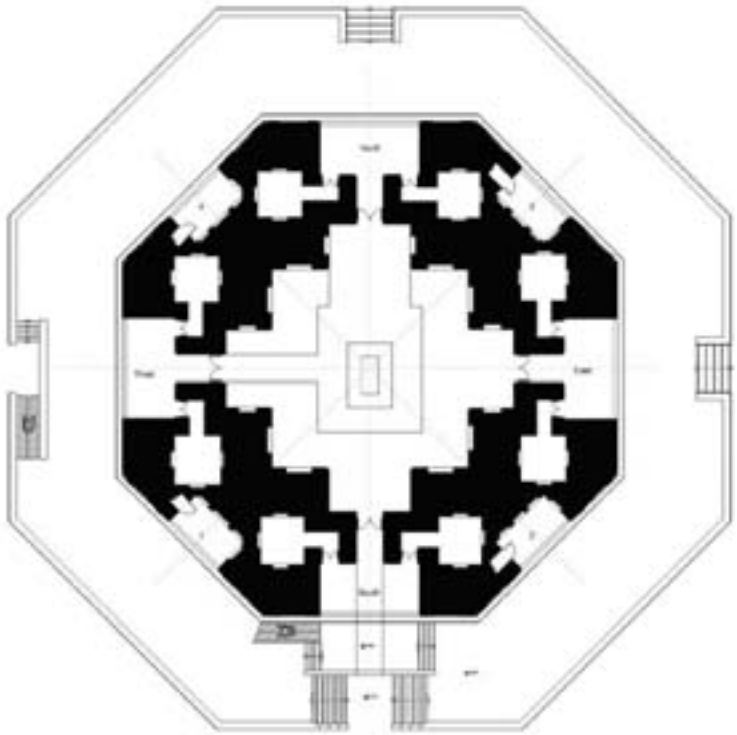
The mausoleum in its current state comprises an octagonal structure with two intersecting cross-axes organised on six distinct levels, and built of fired brick. Following an Iranian and Central Asian tradition, it features an outer dome constructed on a high drum sitting above a ribbed inner dome. The underground crypt of the mausoleum is where Timur Shah is buried. Accessible through a low brick-vaulted corridor

leading from the southeast, the crypt is dominated by four massive brick piers, between which span shallow arches and domes, supporting the main floor of the central space. On four sides of the crypt are deep recesses, from which ventilation ducts lead up to the main external *iwans* on the level above.

At the centre of the raised ground floor of the mausoleum is a square central space, surrounded by a brick-masonry structure with an octagonal

Ahmad Shah Durrani Mausoleum in Qandahar, photographed in 1971.





Left: Ground-floor plan and section of the Mausoleum of Timur Shah.

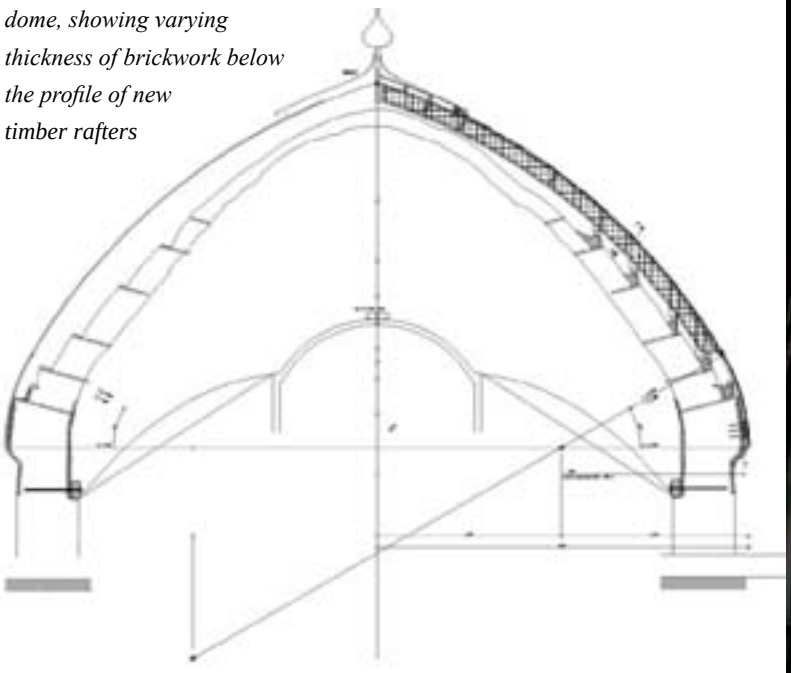
Sections of the damaged upper dome were removed during conservation works. All materials were manually carried to the upper levels up a temporary timber stair.

plan on its exterior. This structure has four deep, double-height *iwans* on both the inside and outside of the main elevations, and a series of smaller openings in the secondary facades, with eight rooms and four staircases set in to the corners of the massive brick masonry. The floor of this level is about 1.2 metres above ground, with a continuous marble string-course below elevations of fired facing bricks.

Narrow brick stairs lead up from the four secondary external niches to the first floor of the mausoleum, housing sixteen brick-vaulted spaces of varying size, encircling the central space. The smaller rooms lie at the main axes of the building, and give onto both the external double-height *iwans* and internal niches, while the larger spaces give only to the outside.

Three of the original four flights of stairs now lead up to a second floor, comprising a flat roof around the 16-sided drum supporting the domes. The brick masonry of this drum has four arched openings on the main

Cross-section of the upper dome, showing varying thickness of brickwork below the profile of new timber rafters



elevations of the mausoleum and four blind arches in the internal corners, which form the transition between the square central chamber and the springing of the inner ribbed dome. The zone between the springing of the lower and upper domes is made up of a cylindrical upper drum of masonry that is more than a metre thick. Access to the upper surface of the lower dome, which is made up of a series of vaults between structural brick ribs, is by means of a single arched opening to the south.

The upper dome rises from the cylindrical drum, where a number of horizontal timber ties were found within the brick masonry. With evidence of extensive repair, the dome is of varying thickness, narrowing towards the apex. A structure of timber joists had been erected over the upper dome, supporting a protective outer layer of iron sheets.

TECHNICAL APPROACHES IN CONSERVATION OF THE MAUSOLEUM

The mausoleum was in poor state of repair when surveys were begun in the spring of 2002. Part of the upper brick dome had collapsed, due to war-related damage and lack of maintenance. Rainwater had penetrated parts of the drum of the upper dome, where several small trees had taken root in the brick masonry. The flat roof around the lower drum was also in poor condition, and ingress of rainwater had damaged the masonry vaults below. Accumulation of earth and waste in and around the base of the building had contributed to rising damp from the poorly

Prior to removal of unstable brick masonry, the damaged upper dome was propped.

The interior of the upper dome shows signs of having been built in stages.

The drum of the upper dome was temporarily strapped during repairs to the masonry, for which specially fired bricks (below) were set in lime mortar.

drained site. A complete survey was only possible after clearance of accumulated waste, and re-location of several of the container-shops that had occupied the site, abutting the monument.

One of the first issues to be addressed in the conservation of the mausoleum was repair of the upper brick dome, whose partial collapse was affecting the structural integrity of the building. Initial structural assessments undertaken in the autumn of 2002 confirmed that the damaged section of the dome could indeed be re-built. It appeared that the dome had been constructed in stages, using 'skins' of brick masonry laid in relatively weak lime mortar, which had subsequently been repaired in parts. In order to plan for conservation, it was necessary to establish how the force from these layers of brickwork was transmitted to the supporting drum, which was cracked in a number of places.

The removal of the damaged roof sheeting and timber structure, as well as the mud plaster that had been applied to help waterproof the damaged structure, allowed for a detailed inspection and measurement of the upper surface of the dome. This exercise confirmed that the dome had been built over a period of time, and that the masons seemed to have had difficulty in completing it, as it weathered and deflected, distorting its geometry.

In order to access the damaged masonry, a bamboo platform was erected over the lower dome, using apertures that had been left in the inner face of the drum at the time of the original construction. Traces were found of two timber ring-ties, virtually destroyed by dry rot, laid within the brick masonry of the drum. In order to maintain the stability of the undamaged brick masonry, two temporary belts were installed and tensioned around the outside of the drum. A reinforced concrete beam was then poured (at a height of 15.5 metres above ground) on the inside ledge of the drum, and anchored into the brick masonry with 48 stainless steel anchors, tensioned to 20 tons.

Based on an analysis of the structure, it was decided to remove the unstable edges of the damaged section of the upper dome and part of the masonry drum, and re-build these in a manner that as closely as possible matched the original. Newly made bricks of the same size (20 × 20 × 3.5 centimetres) as the originals, fired to a relatively low temperature (in order to match the strength of the surviving masonry) were laid in lime mortar prepared with putty from local sources that had been slaked for a minimum of eight weeks. The geometry of the new section also needed to match the existing masonry, which comprised of six layers of brickwork at the springing, reducing to two at the apex. The

repairs were further complicated by the fact that ring forces on which such structural membranes would normally rely on for equilibrium could not be transferred between old and new brick masonry. Experienced masons from Herat were engaged to undertake the repairs, and were made familiar with the distorted geometry and unusual characteristics of the original masonry, in order to ensure a good match.

The damaged sections of the masonry were closed at the end of October 2003, after which the exposed dome was temporarily covered for the winter. Upon inspection in the spring of 2004, joints around those bricks that had loosened due to shrinkage were again filled with lime mortar.

Given that the metal-sheet roof and its supporting timber structure that had been removed from the damaged dome were not part of the original scheme, a range of alternatives were considered for the final covering, which also needed to provide an appropriate external profile. Although the team considered the construction of an upper covering dome, as exists in other mausoleums, this would have significantly increased the weight of the structure, whose performance in future earthquakes would be difficult to predict.

In order to determine an appropriate profile for the final covering, a harmonic curve was identified to match the geometry and proportions of the structure below. This geometry formed the basis for the fabrication of composite timber rafters that support a new 'shell' roof, which effectively spans over the repaired dome and transfers horizontal forces only to the newly reinforced masonry at the top of the drum. A series of concrete upstands were constructed on the upper surface of the dome in order to provide a level base for positioning a total of thirty-two timber rafters, of varying lengths, supporting the shell roof. The tensioning belts that had been used around the drum during the dome repairs were re-positioned around three of the upstands, to ensure compression between the old and new sections of brick masonry on the upper dome.

The design and fabrication of this lightweight structure was subject to a degree of trial and error, as it was necessary to explore the potential of locally available materials and fixings. The rafters themselves were built of Russian pine boards laid at right angles, screwed and glued, with attached timber webs. All rafters, the largest of which measures some 13 metres long, were hoisted by hand to the top of the building, as no crane with adequate reach was available in Kabul at that time. Once aligned and fixed in place, timber boarding was screwed in a circumferential pattern over the rafters, as a base for the fixing of galvanised sheeting.

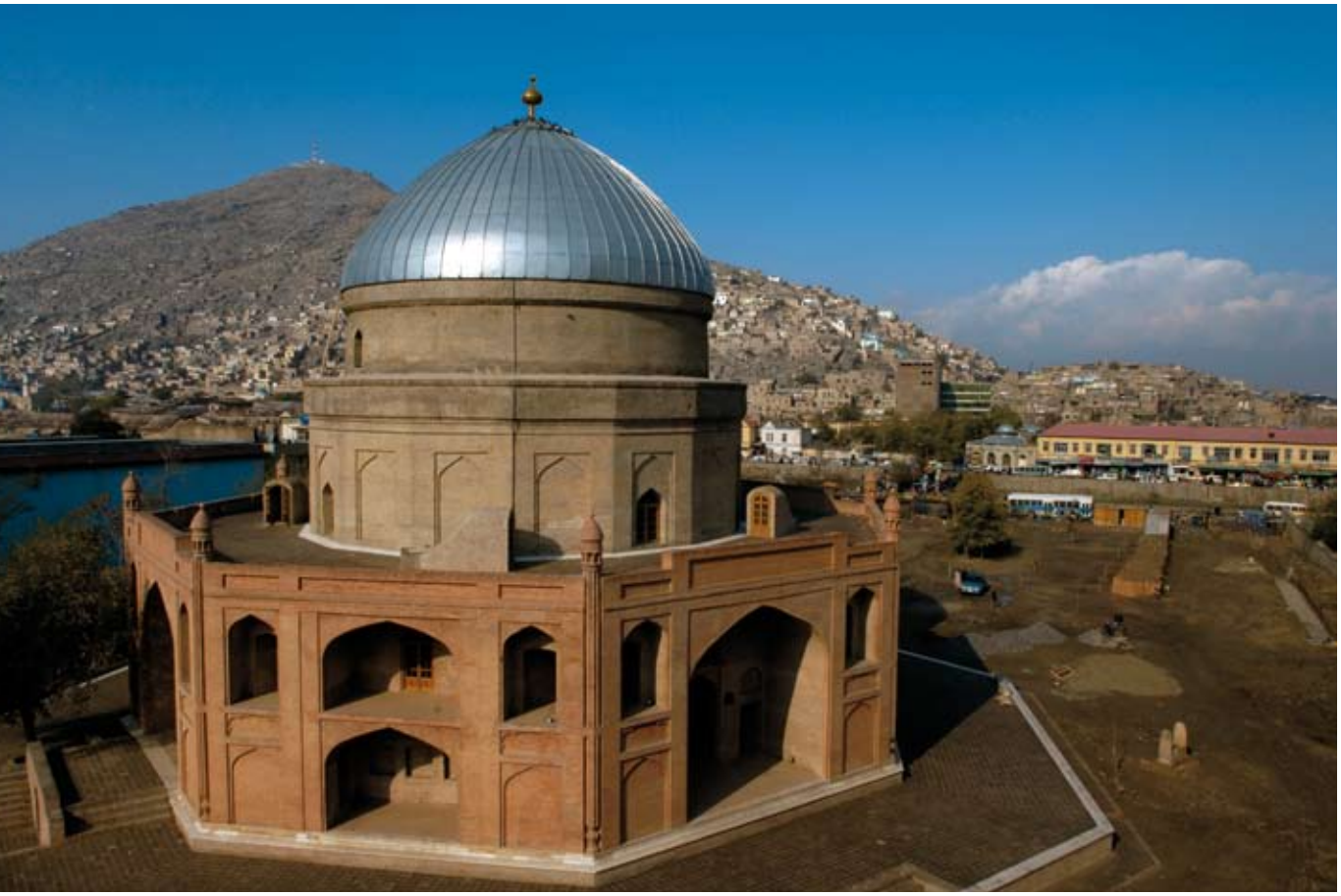
New brickwork being laid to match the coursing of the original dome.

Fixing timber planking to the radial rafters, before galvanised iron sheeting was laid over the dome.

The repaired finial being raised to the apex of the dome and, below, the restored mausoleum with its new terrace at ground level.

A batten seam system of galvanised iron sheeting, which was familiar to local craftsmen, formed the final weatherproof covering of the dome. The lower edge of the shell roof was extended below the base of the rafters by means of timber boards that were bent, glued and screwed to the required radius, and fixed back to the drum masonry. This enabled protection of the drum masonry, while providing for ventilation around the entire lower edge of the roof.

In parallel with repairs to the main dome, earth was removed from the flat section of the mausoleum roof, and the two masonry vaults that had begun to collapse as a result of moisture penetration were propped and repaired. The spaces between the vaults were re-filled with crushed bricks, stabilised with cement slurry, over which a layer of lime concrete topped with waterproof isolation was laid, before finishing with brick paviors laid to falls. The existing internal downpipes were repaired and lined with PVC pipe, leading under the new platform to the garden. The decorative brick finials that had been subsequently added to the



building were repaired, and a new parapet built of brick masonry, replacing damaged concrete elements that were added in the 1960s.

The elevations of the lower section of the mausoleum had at some stage been finished with facing bricks, which were replaced where necessary. While the reveals of several of the external *iwans* retained traces of gypsum plaster, it was decided to remove this in order to expose the high-quality brickwork, which was re-pointed in places.

In order to protect the damaged lower sections of masonry, and to facilitate public access, an octagonal brick platform was built extending some seven metres around the mausoleum, with stairs or ramps introduced on four sides, including the entrance to the vault leading to the crypt on the eastern elevation.

In recognition of the unfinished state of the interior of the mausoleum, repairs were restricted to conservation of the single small dome that showed traces of plastering, re-pointing of the soffits of masonry domes and vaults, and the brushing of accumulated dust from the wall surfaces. Internal floors were re-surfaced with brick paviors of similar dimensions to the originals.

Although there were traces of fixings for frames in only a few external openings, glass doors and windows were designed, manufactured from hardwood and fitted throughout the mausoleum, in order to render the building more useable. In addition, a network of electrical conduits was laid throughout beneath the new floor finish, on which switches and sockets were installed internally.

THE CONTEMPORARY USES OF THE MAUSOLEUM

Being an important funerary structure, the uses to which the restored mausoleum can be put are clearly limited. Its location between the riverbank and the busy commercial thoroughfares of Mandawi and Jade Maiwand, however, suggests that appropriate public events might be held on the main floor of the mausoleum. Indeed, during the last stages of the conservation, the central space was the setting for a series of weekly lectures and seminars, aimed at introducing students of architecture and engineering to new ideas about building and urbanism. As of late 2005, the central space has been used on a regular basis for meetings of the Kabul Old City Commission, a group of Afghan experts who have been given responsibility to oversee safeguarding and planning initiatives in the area. Since its completion, the restored

The ribbed brickwork on the inner side of the lower dome.

Restored plasterwork in the first-floor ambulatory of the mausoleum.

Recessed bays in the new brick perimeter wall around the reclaimed park.

Right page: Computer model of the scheme for an arcaded market on both sides of the reclaimed park area and a perimeter wall along the riverfront.

mausoleum has received many Afghan and international visitors, and it is envisaged that it might be used for exhibitions or appropriate public and cultural events. Now that they are partially serviced, some of the first-floor spaces are temporarily being used as site offices and could, in time, house municipal staff engaged in providing services for the population of the old city area.

AREA DEVELOPMENT INITIATIVES AROUND THE TIMUR SHAH MAUSOLEUM

In a situation where public or private investment in the rehabilitation of war-damaged property and the upgrading of basic services is limited, where pressure on city-centre land is intense and where a coherent vision for urban development in Kabul is yet to emerge, the conservation of such a landmark monument must be matched by physical rehabilitation and adapted socio-economic development initiatives addressing its wider urban context.

Today, the mausoleum stands in an environment that leaves no traces of the *châhâr bagh* in which it was originally built. The residential quarters that encroached on the south-western end of the garden around the mausoleum have in turn fallen into disrepair, and are now largely used for small-scale manufacturing (primarily of sweets) and commercial storage. Despite being earmarked in the 1964 Master Plan for comprehensive redevelopment, access is still through a network of narrow alleys and streets, which presents very real problems for the commercial activities that now predominate in the area. The prevailing ban on all new construction has not deterred owners from erecting large corrugated-iron roofs over their property, before tearing down the existing buildings and, in some cases, constructing new premises beneath them.

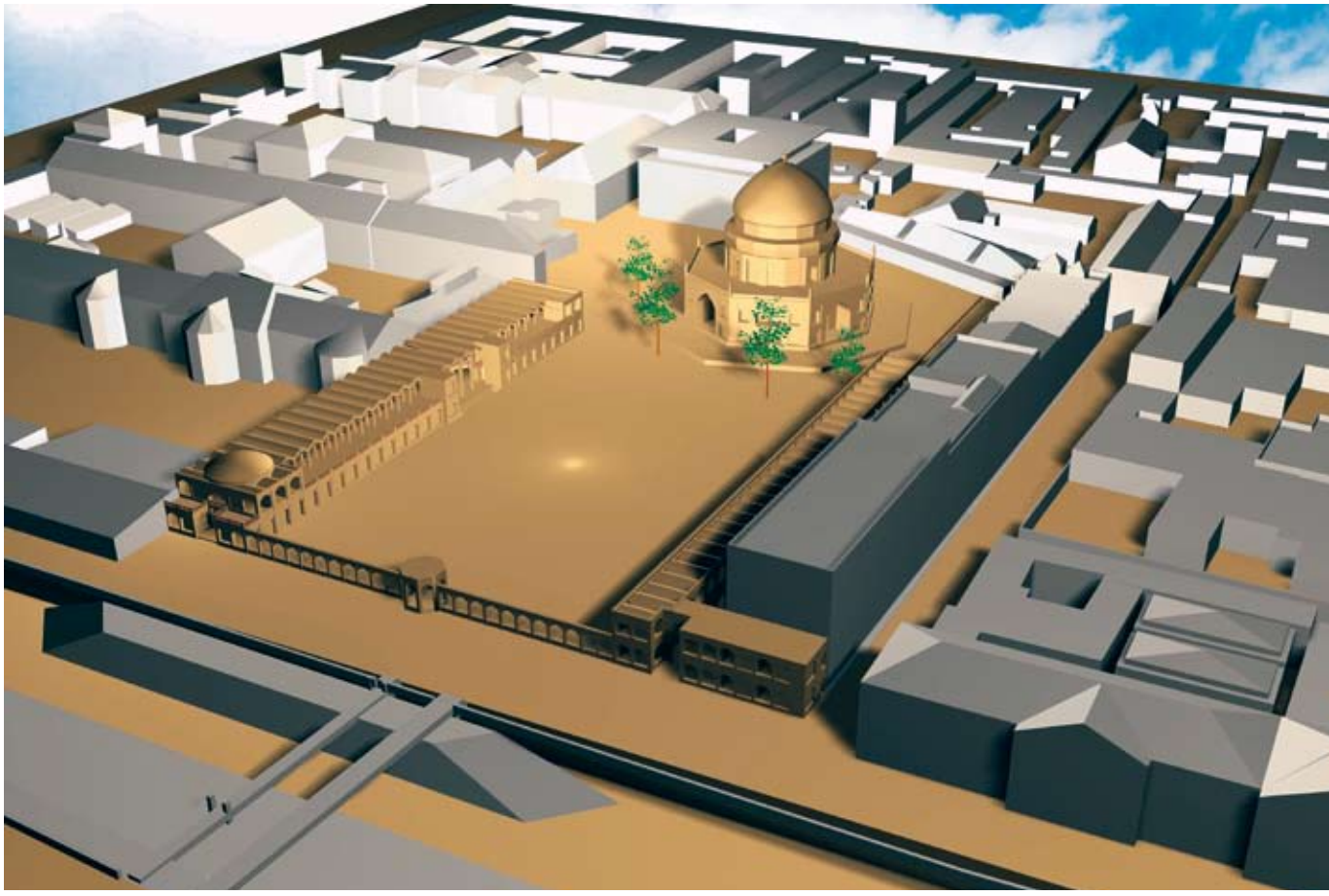
In order to better understand the process of transformation that was taking place in the Timur Shah area, a series of physical surveys and consultations were undertaken during 2003 in the immediate surroundings of the mausoleum and on both sides of the riverfront. This exercise enabled the AKTC team to identify key issues that needed to be addressed as part of the efforts towards revitalisation of the area. Although the results of this diagnostic process were made available to counterparts, it proved difficult to gain acceptance for a locally based, participatory approach from civil servants who had only ever dealt with centralised processes of ‘master planning’.

The surveys made it clear that dealing with the historic buildings of the area only was not sufficient and that wider environmental improvement

strategies were needed. The 'park' around the mausoleum had gradually been occupied by cloth-sellers and tailors, some 200 of whom had set up informal businesses in containers and stalls on the site. Consultations were held with these informal traders during the conservation work, which initially required the re-location of containers and stalls that abutted the mausoleum. Although the occupation of public open space is illegal, most shopkeepers enjoyed tacit protection of municipal staff and the local police.

In recognition of the contribution that such informal commercial activities make to the urban economy, surveys were conducted to assess the options for enhancing the livelihoods of this community, either through re-location or some form of appropriate development. During these surveys, it emerged that the entire block to the east of the mausoleum is owned by various ministries, and that (apart from the Ayesha Durrani school) most of the property is in fact derelict. This led to a proposal

The arcaded wall on the north-west side, screening the park from the busy riverside street.



The Andarabi Mosque with its roof restored, in 2004.

for consolidation of ownership of this commercially valuable land, to enable comprehensive redevelopment of the area, including construction of low-rise, high-density commercial premises and improvements in services and access. While the response to this proposal, which envisaged a public-private partnership, was generally positive, no action was taken by the government to assess the status of their property or to realise the scheme.

As part of this redevelopment proposal, a design for reclaiming the Timur Shah Park was prepared, framing the park with lines of new commercial premises, which, it was proposed, might house a proportion of the existing small-scale businesses, along with others, on the site. Comprising two arcades of shops, inspired in part by the traditional covered bazaars that existed in the old city, this proposal was initially accepted by the municipality who would in time derive an additional income from leases in the new premises. After protracted negotiations about management of the development, the mayor resolved that no construction should take place on an area designated as a park, which he proposed instead should be entirely reclaimed as a public green space. To this end, municipal staff removed all containers and stalls from the park area in autumn 2005.

In response to this reclamation of the public park around the Timur Shah Mausoleum, whose frontage to the Kabul River became again visible, a programme of landscaping was initiated in late 2005. This began with the clearance of significant amounts of waste, followed by extensive levelling and re-planting, principally with mulberry trees. Although the extent of the new park is but a fraction of the original *châhâr bagh* that once surrounded the mausoleum, reference has been made to historic photographs of the site. A network of stone pathways is being laid to follow the important north-south pedestrian route between the banks of the Kabul River and the busy commercial area of Mandawi behind it. In order to protect from future encroachments, and ensure a degree of tranquillity in this busy city-centre environment, a brick masonry wall was constructed around the perimeter of the park, which will be re-opened to the public in the summer of 2007.

While revealing the pace of transformations in the urban surroundings of the Timur Shah Mausoleum, physical surveys have also enabled the identification of buildings that merit immediate safeguarding, in the light of widespread illegal development. Having assessed a range of options, support was provided for repairs to the distinctive domed roof of the Andarabi community mosque, located directly across the Kabul River from the mausoleum. Along with the Shah do Shamshara

Mosque to the south, it forms part of the architectural ensemble that was constructed along both banks of the river in the early 20th century, but which suffered damage during the recent conflict.

This double-storey range of riverfront buildings, with workshops over shops on the street level, is an important vestige of the introduction of western concepts of urbanism to Kabul. In recognition of this, the entire frontage was surveyed, damage assessed and the ownership of the various shops and workshops registered during 2004. Support was provided in 2005 for the repair of one of the central bays, both as demonstration of the potential of the building and as a deterrent to municipal planners, whose proposals for widening of the street envisaged wholesale demolition of the historic frontage.

The restoration of the Timur Shah Mausoleum and the improvement of the surrounding areas are the physical outcomes of a protracted process of analysis and exploration, negotiation and action, from which important lessons have been learned for AKTC's work elsewhere in Kabul, and in Herat. Despite the challenging physical and institutional environment in which the works were undertaken, the project stands an example of how an important historic monument can act as a fulcrum for a wider process of regeneration in a fast-changing urban setting.

Early 20th-century facades along the Kabul River, adjoining the Timur Shah Mausoleum, have been renovated.

Conservation and Urban Rehabilitation in Herat

Arash Boostani and Jolyon Leslie

View across the rooftops of the old city of Herat to the Masjid Jame.

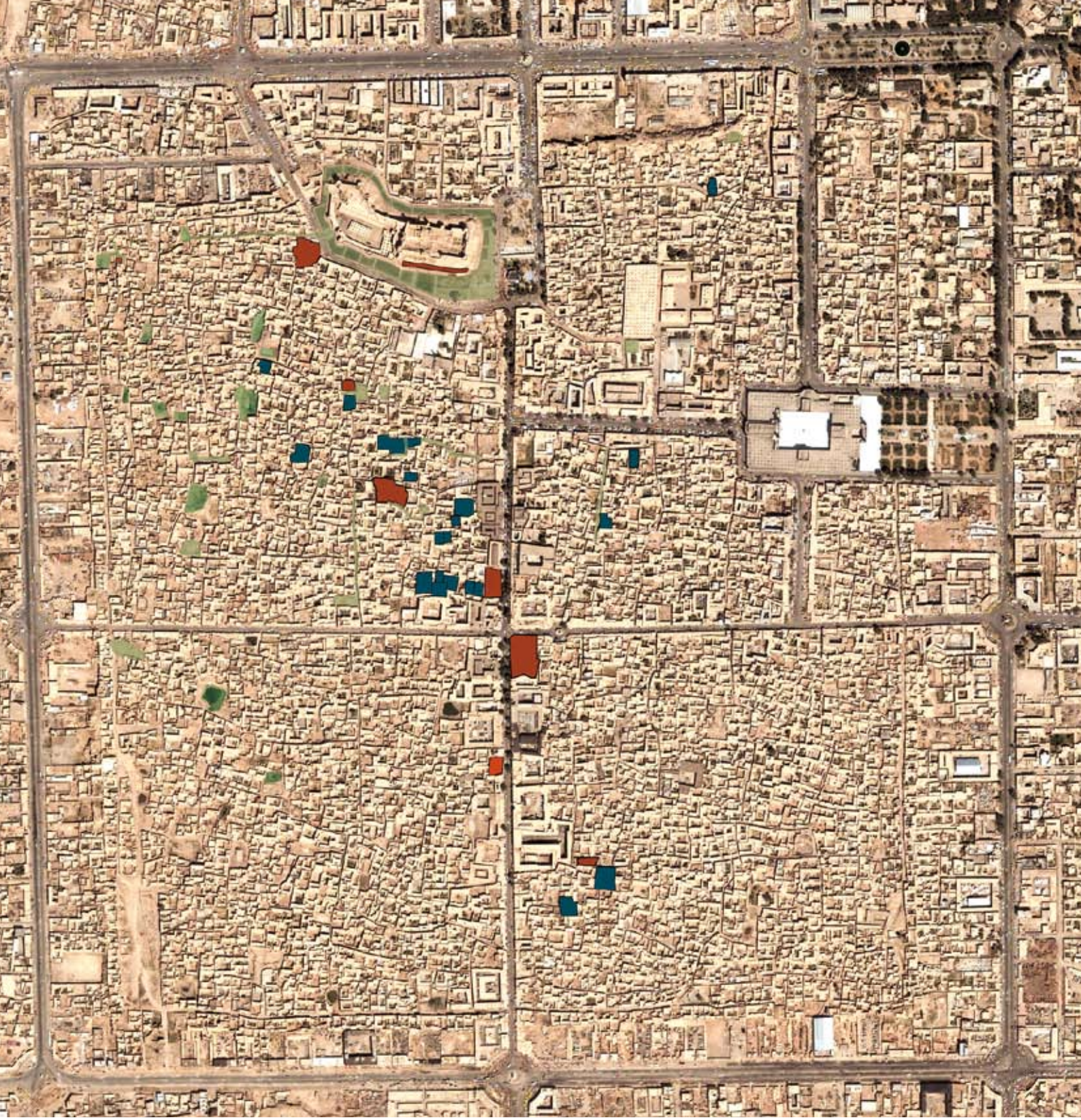
Left page: Covered entrance area of the Mokhtarzadeh Serai in the Bar Durrani quarter of Herat.

Having largely survived periods of neglect and conflict, the old city of Herat now faces new threats, as new-found prosperity drives a construction boom, and uncontrolled 'development' spreads throughout the traditional historic fabric. In the midst of this damaging process of transformation, AKTC established a programme in early 2005 to document the surviving fabric, as a basis for initiating pilot conservation and upgrading measures in key neighbourhoods, and promoting more effective urban management through strengthening of local institutional capacity. While significant progress has been made on mapping the physical environment, establishing systems for monitoring transformations and the conservation of several important historic properties and related upgrading, it has proved more difficult to bring about much-needed institutional reforms.

URBAN HISTORY OF HERAT

From its origins as an outpost of the Achaemenid empire to the setting-out of a rectilinear walled city by the Ghaznavids, Herat has had a turbulent history. It became a centre for Islamic culture and learning under Timur, whose son Shah Rukh went on to become an important patron of the arts and included the poet Jami and the miniature painter Behzad in his court. Other members of the family commissioned the monumental buildings that made Herat renowned through the region. After falling into relative decline under the Mughals, Herat was ruled by the Safavids of Persia until re-establishing its status as an independent city in the 18th century, under the governorship of Timur Shah, son of Ahmad Shah Durrani. Captured by Dost Mohammed in 1863, it was incorporated into the emerging Afghan state. Allegedly to protect the city from an advance by Russian forces, British troops in 1885 destroyed one of the most important monuments in Herat, the Musalla complex built by Gawharshad in the 15th century.

Situated at a crossroads of regional trade, in the midst of a rich agricultural zone, Herat saw significant physical growth in the 20th century, including the construction of the new administrative centre for the region to the north-east of the old city. As had long been the case throughout the region, homes continued to be constructed of mud-brick, with domed or vaulted roofs, ranged around secluded internal courtyards. The historic pattern of settlement within the massive earthen walls persisted, even as these fell into disrepair. Until the 1950s, when suburban life became



Satellite image of the old city, showing areas of AKTC intervention.

Public buildings under rehabilitation

Residential buildings under rehabilitation

Environmental works

an option for those who could afford it, wealthy families still lived in the old city, and the style and form of many surviving homes from this era bears out how they moved with the times, while using traditional materials and forms.

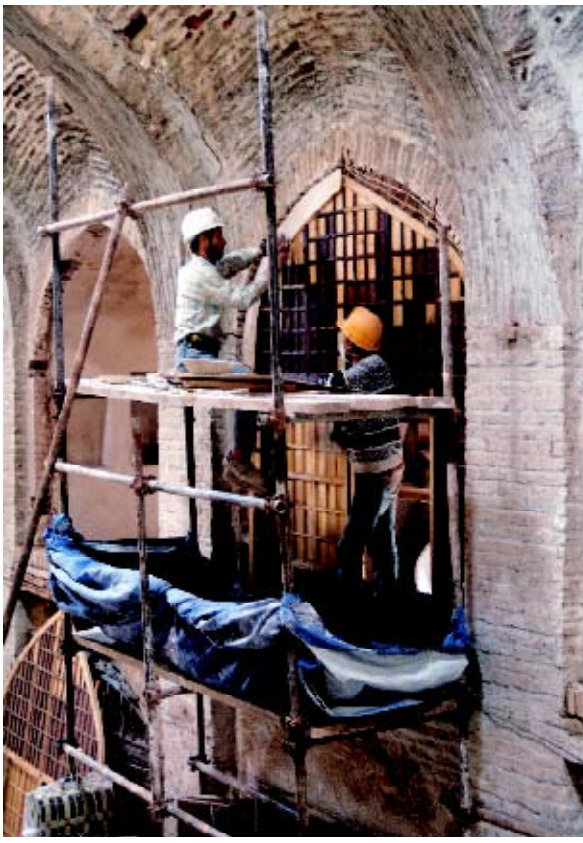
While most growth during the 1960s took place outside of the old city, vehicular roads were cut through parts of the traditional fabric, radically changing its character in some places. The area maintained its significance as a residential zone, however, and was still home to some

60,000 people until unrest broke out in the city in 1979. While the Herat Master Plan of 1978 foresaw ambitious new development elsewhere to accommodate the anticipated urban growth, no specific provision seems to have been made at this time for the old city.

With the conflict that started in 1979, a front-line was established between government and opposition forces along the western side of the old city which, together with adjoining villages on the outskirts, were de-populated. The inhabitants either resettled in eastern parts of the city or fled to Iran, which was host to more than two million Afghan refugees at the time. Traditional mud-brick domed homes of the old city soon fell into disrepair or collapsed, while such infrastructure as existed was damaged or looted during the ten or more years of conflict that followed. By 1990, damage surveys indicated that more than half of the property in the western side of the old city was derelict, with only a few families living in the ruins of abandoned homes. In 1992, with the fall of the central government in Kabul, control of Herat changed hands and the old city became accessible for clearance of mines and unexploded ordnance. Some families began after 1993 to re-build their homes and resettle in the war-affected parts, although there was still negligible access to basic services or infrastructure.

The traditional fabric in the western parts of Herat old city is in a poor state of repair.

Repairs to Bazaar Abresham, one of the few surviving covered markets in Herat.



CURRENT SITUATION IN THE OLD CITY

An *ad hoc* process of recovery continued until 2002, by which time the war-affected areas in the old city had been largely re-populated. With the return of refugees, pressure on affordable housing in the city as a whole intensified, and more owners returned to repair or redevelop their property in the old city. This resulted in the displacement of poor families who had occupied derelict homes, and who then had to move on to more marginal areas or camps for the displaced, outside of the city. One in three families in the old city rents accommodation, which renders vulnerable those who rely on intermittent casual labour for their livelihood. If unable to maintain rental payments, these families depend on the benevolence of landlords, are forced into debt or are evicted. After unemployment, access to adequate services is the issue most commonly cited by residents of the old city as a preoccupation. For those owners undertaking repairs of traditional homes, the lack of corresponding official investments in repairs or extension of infrastructure has meant that living conditions remain poor, especially in densely populated areas, where most homes are subdivided. Some better-off returnee families in the old city, accustomed to modern homes while in exile, have demolished their traditional dwelling, rather than attempting repairs or upgrading. In the absence of an effective system of building control,

Interior of Châhâr Suq Cistern prior to restoration.

The Timche Qaysari Serai with the repaired dome of the cistern in the background.

incongruous three-storey concrete villas, complete with mirror-glass facades, are now rising above the low skyline of the old city.

As demand for city-centre land has grown, so too the commercialisation of residential areas in the old city has become more widespread. The impact of the multi-storey 'markets' spreading along the main roads is as much environmental as aesthetic. Most new buildings include a basement, the excavation of which takes place with little regard for existing drains or water pipes, which are simply blocked off or cut. Moreover, developers of these buildings make no provision for waste and for parking demands that are generated, thereby exacerbating congestion and adding to the environmental risks facing neighbours. With almost half of available commercial property along one main road to the north of the old city empty and un-let, the economic viability of these 'markets' remains unclear.

In order to address the complex range of issues affecting the old city, key strategies adopted within the AKTC programme include support for documentation, monitoring, upgrading and conservation in specific clusters in the old city, coupled with measures to strengthen the capacity of and coordination between urban institutions.

SURVEYING AND UPGRADING BASIC INFRASTRUCTURE IN THE OLD CITY

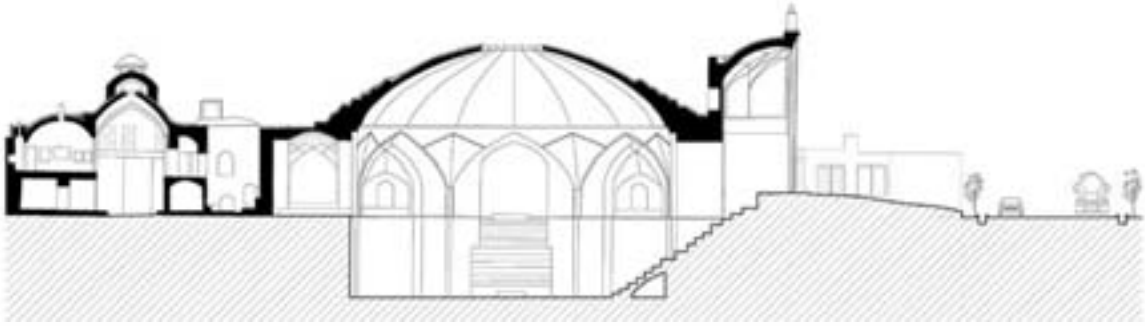
Given the pace of change and the absence of documentation of the old city, one of the first priorities for AKTC was to map the physical environment and establish an appropriate system for monitoring ongoing transformations. A preliminary survey during early 2005 of historic residential property in two quarters provided a basis on which to identify specific clusters in which to initiate pilot repairs and upgrading works. A more detailed property survey of 25,000 residential and commercial premises was subsequently undertaken by a team of fifteen AKTC surveyors (ten of whom were women) during 2005-2006. This has yielded useful information on location, occupancy and current use, key construction or architectural characteristics, age and date of alterations, state of repair, availability of services and level of vulnerability of the property. Now mapped, this information serves as a valuable resource for planning initiatives, and for ongoing upgrading and conservation work.

The results of the property survey illustrate the diversity of the various quarters, due to the combined impact of the conflict and redevelopment. Although the bulk of houses are still traditional in form and construction, two out of ten homes in the old city are now modern, compared to one

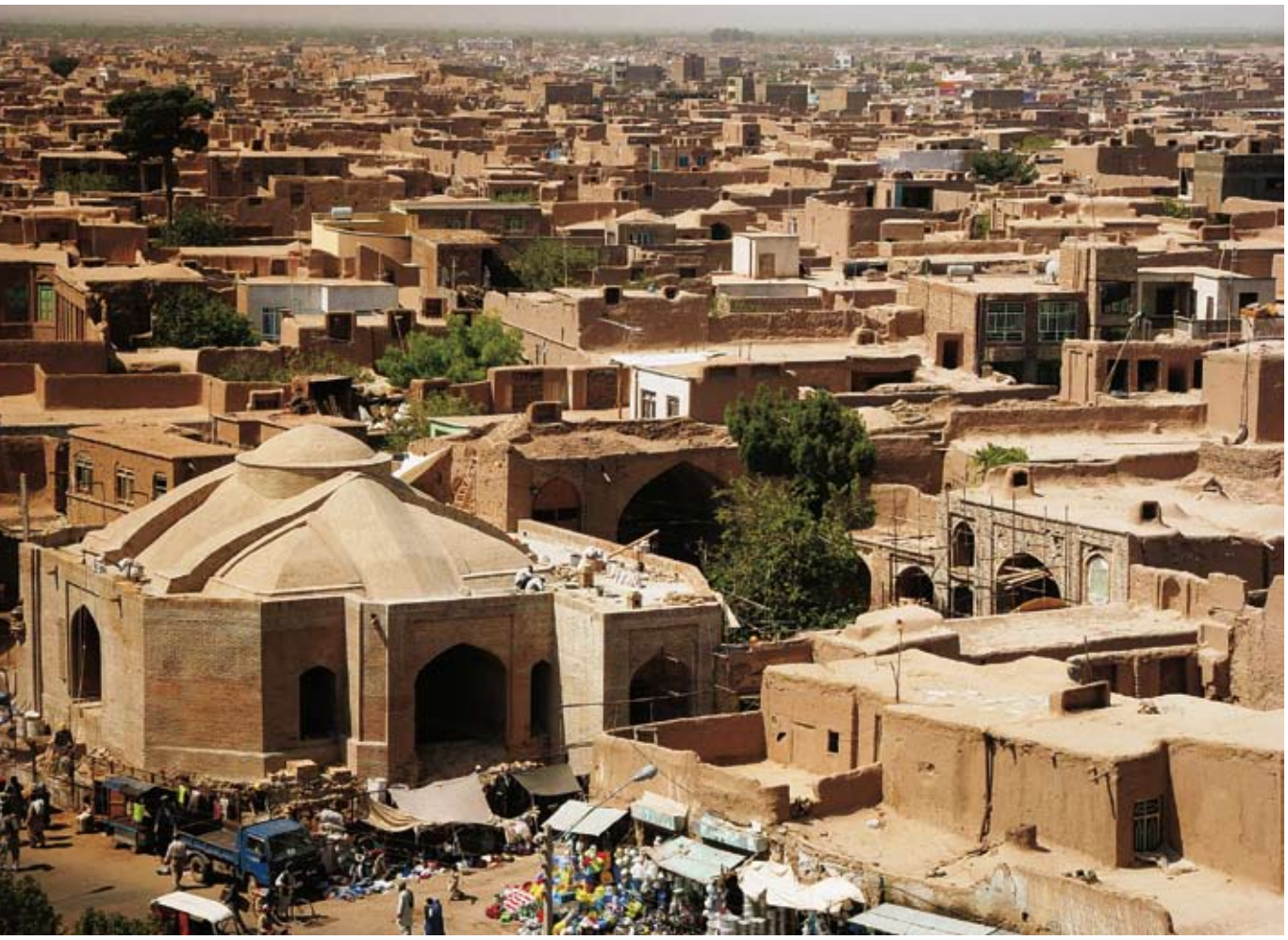
in ten homes that are considered to be of social or historic importance. One in five homes in the old city is now occupied by more than one family, with indications that densities are gradually increasing in some neighbourhoods. Three-quarters of commercial premises are modern, with more than 170 new shops or markets recorded as having been built in the past five years, often on the site of illegally demolished homes. While subsequent surveys will explore in more detail the status of individual households, half of the residents were recorded to be reliant for water on shallow wells, many of which are contaminated, for their domestic needs. Most liquid waste now flows through surface channels into open sumps, which pose a serious health threat to those inhabiting the adjacent houses. The pattern of under-investment extends to public facilities, with only one clinic and six small schools to serve 62,000 people.

The findings of these surveys suggest that the upgrading of infrastructure will be critical to the recovery of the old city. In order to address some of the most immediate needs, support has been provided since 2005 by AKTC to community groups to organise the evacuation of liquid waste from fifty open sumps in residential areas. Along with repairs to drainage channels and collection of accumulated waste in the Bar Durrani quarter for disposal outside of the city, this initiative has directly benefited almost half of the population of the historic quarters. Given the density of settlement, many pedestrian alleyways have had

Open sewer between houses in the Bar Durrani quarter.



Sections of Châhâr Suq and bazaar complex



The Malik Cistern and Mosque complex under restoration and, below, preparing bricks for use on repair to the roof of the cistern.

rooms or terraces built over them. Constructed of fired or mud bricks, these vaulted *dalan* provide safe, covered means of access to adjacent homes, but many of these were demolished for reasons of security, while others fell into disrepair. Support has been provided by AKTC for the repair and paving of one of longest surviving vaulted *dalan* in the Bar Durrani quarter, among others, as a demonstration of the potential of access improvements.

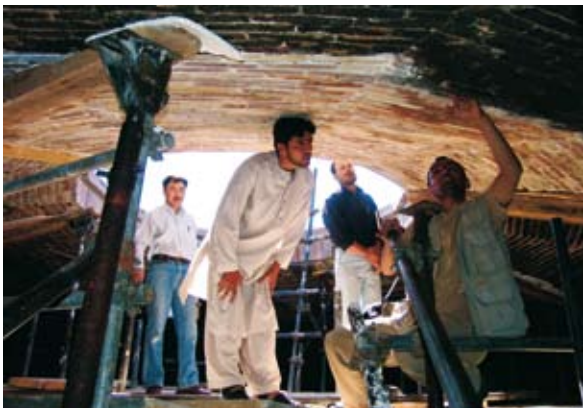
In a context where unemployment is a major preoccupation, upgrading activities have generated much-needed jobs for several thousand skilled and unskilled workers since 2005. While the impact of this range of pilot upgrading initiatives is significant, there is clearly a need for a scaling-up of investments in network infrastructure in the old city, along with the provision of additional health and education facilities, if the initial gains made to date are to be sustained in the longer term.

REHABILITATING PUBLIC BUILDINGS AND SPACES

In parallel with support for upgrading of basic infrastructure, AKTC has embarked on the conservation of historic public buildings in two clusters, of which the Châhâr Suq and Malik Cisterns form the nuclei. In the case of Châhâr Suq, the focus was initially on repairs to the covered cistern built in 1634 and which remained a vital source of water for the inhabitants of the old city until the 1970s. With a clear span of 20 metres, the brick dome is the largest in the country. Built on a massive octagonal supporting structure, legend has it that the masons who raised the dome used straw-filled bags to support the faceted brick masonry during its erection. Having undergone a range of attempts at repair over the years, the structure in 2005 revealed significant settlement of parts of the superstructure, caused in part by excavation of brick masonry by shopkeepers in the adjoining bazaars. The first stage of conservation of the cistern entailed removal of more than a metre of accumulated earth from the roof, to enable examination of the state of the brick structure. Following replacement of damaged sections of brickwork around the dome, the roof surface has been finished with brick paviors. Subsequent interior work included repairs to brick relieving arches under the dome and the re-opening of vaulted openings to the east and south of the main space. The tank itself continues to be used as a subterranean workshop for AKTC's conservation in the old city, and will eventually be used for cultural or educational events.

Discussions are under way to reclaim the public open space in front of the main *iwan* of the cistern, which lies at an important intersection in the centre of the old city, but which has been encroached upon by shops. In addition to this street-level space, the newly repaired roof of the cistern and adjacent bazaars provide a large recreational area, with views over the rooftops of the old city to the east and north. Repairs continue to the adjoining covered bazaars, which are all that survive of the many markets that were once the commercial heart of the old city. One of these bazaars has traditionally been a centre for silk-weaving, and it is envisaged that, once restored, it might form the nucleus for the economic regeneration of this part of the city.

Located next to what was once the main northern gate of the old city, the Malik Cistern was used to store water for the residential neighbourhood adjoining Qala Ikhtyaruddin, the citadel of Herat. This has been the centre of a cluster of conservation works in the north-western part of the old city. Following removal of waste that had for some years been dumped in the structure, surveys were made of the cistern and adjoining



Inspecting repairs to the main dome over the Châhâr Suq Cistern and restoration work on the main entrance iwan *of the complex.*

The Malik Winter Mosque and courtyard during rehabilitation works in 2007.

Interior of the Timche Qaysari after restoration was completed.

Repair of interior plaster work in the Akhawan house.

summer/winter mosques. Repairs were then undertaken on the brick-masonry vaults and squinches that support a small brick dome spanning over the centre of a rectangular pool. The entire roof was then laid with a finish of brick paviors and, in order to protect the building from traffic along the adjoining street, the original plinth has been reconstructed. Work was subsequently initiated on the adjacent summer mosque, dating from Safavid times, featuring an open brick-arched *iwan* over a raised floor, from which modern concrete was removed and the vaulted sub-structure repaired. The high brick vaults over the prayer space were repaired and the original carved marble inscription fixed back in place. Removal of the modern plaster from the elevation and interior of the semi-underground winter mosque revealed sections of glazed tiling on the elevation of the modest *iwan*. This has been repaired, along with a raised prayer platform in front of the mosque and a row of vaulted study-rooms along the northern side of the courtyard. It is envisaged that the restored cistern will be re-used as an educational centre for the inhabitants of the surrounding neighbourhood.

In addition to these cisterns, two small community mosques have been re-built in the Bar Durrani quarter. The structure of the Haji Adam Khan Mosque had collapsed in the 1980s and, after several unsuccessful attempts by the community at re-building, the last wall fell down in 2004. Technical support was provided for construction of a small traditional six-bay brick-domed structure, which was largely financed by the community. Along with the recently re-built Haji Sharif Mosque to the west, the project provided an opportunity to demonstrate the potential of traditional construction and decorative techniques, including glazed tilework panels derived from those found on other historic buildings in Herat.

CONSERVATION OF HISTORIC HOUSES

In the Bar Durrani quarter, support has been provided for conservation of several homes of particular architectural importance, and which were deemed to be at risk. The first such initiative was the Haider Kebabi house, part of a larger residential and commercial complex that included the Mokhtarzadeh Serai to the south. The house is part of a larger two-courtyard complex, typical of wealthy family residences of the early 20th century. Access is by means of a *dalan*, over which part of the house is built, with a domed octagonal vestibule, or *hashti*, which retains fine brick decoration. With one large brick-domed reception room on the ground floor, the bulk of the family quarters are on the upper level, and retain the distinctive glazed timber screens, or *orosi*. Repairs were carried out to all roofs, some of which were close to collapse, while the restoration of *orosi* screens provided the opportunity to train carpenters

in traditional techniques. Now used by AKTC as a site office, the Kebabi house has been the venue of awareness-raising events with community representatives and visitors to the old city.

The next focus of AKTC's residential conservation was the Attarbashi house, built in the early 20th century by a distinguished Herati physician, and is typical of large family homes of that era. The entrance to the house was originally from a *dalan* over which several of its rooms stood, but which has since collapsed. At the centre of the complex is a large courtyard with a northern (summer) and southern (winter) range of rooms on three floors, including a vaulted half-basement. A collapsed double-height domed space retained traces of fine internal decorated plasterwork and intricate lattice screens. Upper floors on both wings are accessed via external colonnades of timber posts decorated with plaster, behind which are *orosi* screens. To the east is a *hammam* for use by the family, and a small shrine. Documentation of the house took place in parallel with emergency protection of vulnerable plaster decoration. Roofs were repaired and damaged rafters replaced, before restoration of timber screens on both floors. Reconstruction of the domed reception space in the southern range is under way, drawing on the description of the grandsons of the original owner and the pattern of similar homes in the area. The diversity of restoration work in the Attarbashi house has enabled the development of a range of skills among Herati craftsmen, and contributed to efforts to raise awareness among community members and professionals in Herat.

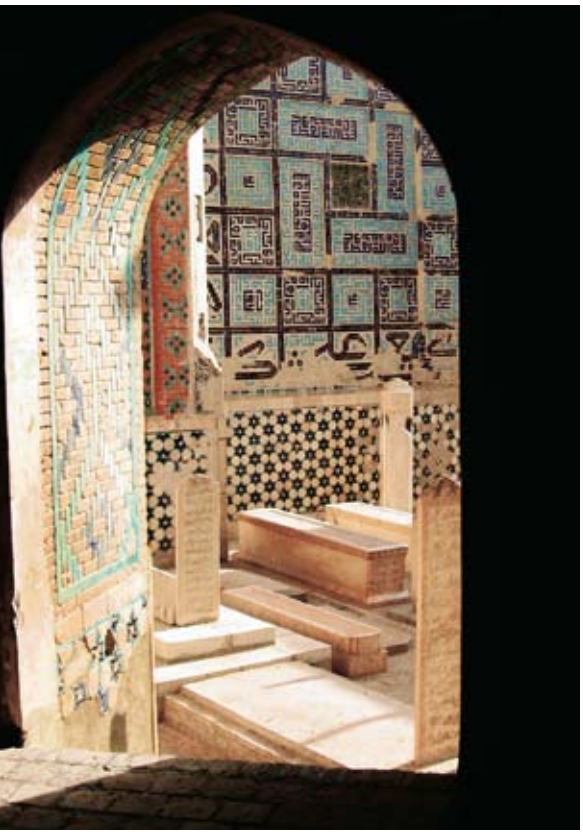
The Akhawan house demonstrates the versatility of the courtyard layout and traditional construction techniques, which were adapted to the aspirations and needs of the owners. The house is arranged on the conventional pattern, with a single-storey northern and double-storey southern range, which extends over the adjacent *dalan*. There is an unusually large family *hammam* on the west side of the courtyard, which gives access to vaulted semi-basements. The principal reception areas retain internal plaster and painted decoration, while the external elevations have characteristic fired-brick decoration of this period. Using moulds taken from the originals, replica bricks were fired in a specially commissioned kiln, as part of efforts to resuscitate traditional crafts.

In addition to full-scale conservation, small-scale household grants (in the form of materials, labour and on-site advice) have been made available to owners of more than twenty-five traditional homes. The aim is to support owners who had already embarked on repairs, but who might not otherwise be able to undertake these effectively, or afford to complete the works.

Reconstruction of brick vaults over the hammam *wing of the Attarbashi house.*

Internal plaster niches in family rooms in the Attarbashi house.

Abdullah Ansari Shrine Complex from the west and, below, fired-brick and glazed-tile decoration in the main iwan.



CONSERVATION OF RELIGIOUS BUILDINGS

The Shrine Complex of Khwaja Abdullah Ansari (1425), situated in Gazorgah to the north-east of Herat, represents one of the most important surviving examples of Timurid architecture in the region. The complex comprises a series of spaces, including a mosque and *khaneqa*, forming a courtyard in which is a graveyard dominated by a tall decorated *iwan* over Ansari's grave. The principal elevations have bold geometric designs, comprising a mix of glazed tilework and fired bricks. Although altered over time, the complex retains much of its original character. Adjacent to the shrine complex is a *khaneqa* known as the Zarnegar, built in the last years of the 15th century. Although in poor condition, the interior of the large central dome retains fine gold and blue painted decoration. Further south lies the Namakdan, a pavilion dating from the 17th century and a fine example of ribbed brick-masonry work.

The initial focus of AKTC interventions was on repairs to the roofs, to prevent further damage to internal plaster and painted decoration. In the case of the Namakdan, structural repairs have had to be made to ensure the stability of the pavilion, which seems to have suffered partial collapse in the past. Reconstruction of the most fragile parts of the structure has enabled the introduction of steel ties in critical parts of the building. The surviving original brick masonry of the central domes has been exposed and restored, as have small sections of glazed tiles on two external elevations. As resources allow, it is envisaged that the garden area around the Namakdan pavilion will be landscaped in a manner befitting a building of this age and importance.

INSTITUTIONAL SUPPORT

With unprecedented urban growth in Herat, municipal and other staff are ill-prepared to cope with the challenges that face them, or deal with the powerful interests behind the ongoing building boom. Not only do many local civil servants lack the professional training or experience, but the level of support provided by the central government in Kabul has been limited. In order to address this, a Commission for the Safeguarding and Development of the Old City of Herat was set up in early 2005, aimed at improving urban management in the historic quarters. Comprising representatives from key institutions and professional bodies, the commission has been mandated to address critical planning issues. One of its first tasks was to reform systems of building permits, and introduce more effective monitoring of new construction, demolition and alterations to property. Although enforcement of these systems remains patchy, the commission continues to serve as a useful forum

for debate between the many stakeholders in the old city. It has also provided an opportunity to embark on joint area-planning exercises in key neighbourhoods. The challenge now is to undertake institutional reforms that will enable officials to monitor and guide urban growth in the historic core in a manner that respects its historic significance.

Additional support has been provided by AKTC to the Department of Historic Monuments in documentation and registration of key historic buildings. Efforts to strengthen local professional capacity have also extended to work with students from Herat University, with a number of students and recent graduates engaged in site visits and lectures about best practices in conservation, planning and urban management. This cadre of young professionals will be in the vanguard of future efforts to rehabilitate other historic centres in Afghanistan.

The challenges facing the AKTC programme in Herat are formidable, and it will take several more years to assess the impact of investments in upgrading, conservation and capacity building. In the meantime, the AKTC team will continue to respond to the need for urgent improvements in living conditions, while undertaking pilot conservation and developing key crafts and professional skills, as a means of ensuring more effective urban management. The key to slowing the pace of destruction of the unique historic fabric of the old city of Herat, however, lies in decisive political action on the part of the Afghan government.

Mapping the results of the property survey of the old city.

The repaired roofs of the west side of the Abdullah Ansari Shrine Complex.

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The Norwegian Embassy in Kabul extended support for upgrading works in 2005 and 2006 in the neighbourhoods of Asheqan wa Arefan, Chindawol and Kuche Gharabat in the old city of Kabul.

The British Embassy in Kabul contributed to the reconstruction of the Pakhtafurushi Madrasa in 2005 and the Shuturkhana Hammam in Asheqan wa Arefan, Kabul, in 2006.

The Embassy of the United States in Kabul in 2005 extended support for rehabilitation of the platform above Baghe Babur, and in 2006 contributed to fitting out the *caravanserai* visitor centre in Baghe Babur.

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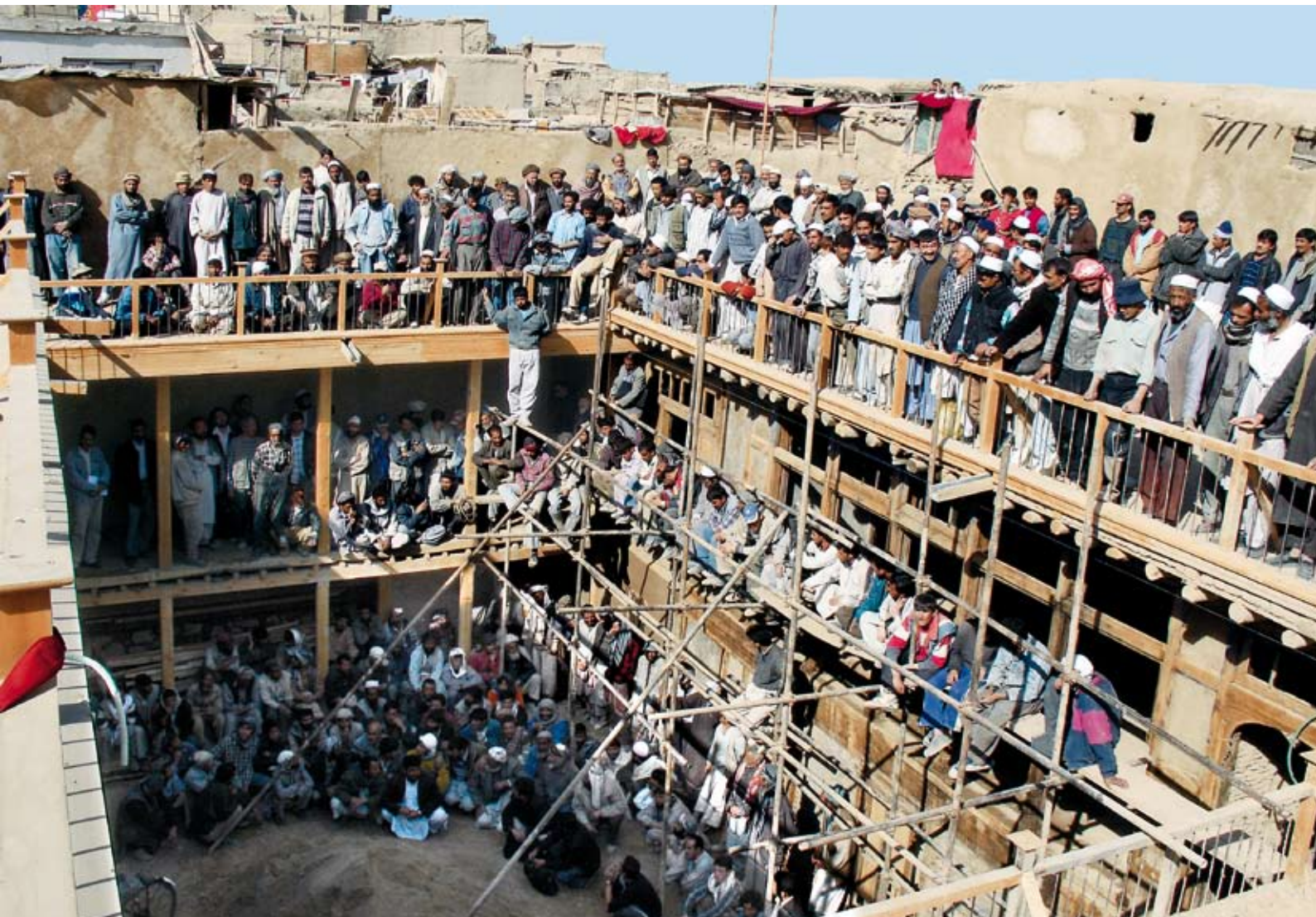

The Aga Khan Development Network (AKDN) is a group of private, non-denominational, international development agencies created by His Highness the Aga Khan, the 49th hereditary Imam of the Shia Ismaili Muslims. It is a contemporary endeavour of the Ismaili Imamat to realise the social conscience of Islam through institutional action. The Network is grounded in Islam's ethics of inclusiveness, compassion, sharing, self-reliance, respect for health and life, the cultivation of a sound and enlightened mind, and humanity's collective responsibility for a sustainable physical, social and cultural environment. The agencies address problems experienced by all citizens, irrespective of race, ethnicity, gender or religion. Together they collaborate in working towards a common goal – to build programmes and institutions that improve the welfare and prospects of people in countries of the developing world, particularly in Asia and Africa.

The Aga Khan Trust for Culture (AKTC) plays a vital role in AKDN's integrated approach of building the broad spectrum of human development – economic, social and cultural – into a comprehensive strategy. The Trust promotes debate about the built environment; proposes exemplars and solutions for contemporary design problems; engages in urban revitalisation of historic sites and social improvement of communities, thus impacting their quality of life; and, through education and cultural initiatives in the realm of music and the arts, aims to position properly the greatness of the cultures of the Muslim world in the global cultural heritage. The Trust seeks to leverage the unique transformative power of culture to improve socio-economic conditions prevailing in many Muslim populations through its various programmes:

• The Aga Khan Historic Cities Programme implements conservation and urban revitalisation and area development projects in culturally significant sites of the Islamic world.

• The Aga Khan Award for Architecture, presented every three years, not only rewards individual architects for exemplary contemporary work but also singles out projects that propose innovative and replicable solutions to problems of social development.

• The Aga Khan Music Initiative in Central Asia is concerned with the revitalisation of traditional music by supporting efforts of Central Asian musicians and communities to sustain, develop and transmit onward musical traditions that are a vital part of their cultural heritage.

• Museum Projects are dedicated to the presentation of Muslim arts and culture – in their historic, cultural and geographical diversity – as a way of contributing to knowledge and understanding.

The Aga Khan Historic Cities Programme (AKHCP) implements conservation, revitalisation and area development projects in historically significant sites of the Islamic world. Its projects seek to mobilise local potential and resources in order to ensure their eventual self-sustainability through operational income, human resource development and institutional management capabilities. Going beyond mere restoration of monuments, the Programme engages in activities related to adaptive re-use, contextual urban planning, improvement of housing, infrastructure and public spaces. Its projects attempt to discover and to mobilise untapped local potential and resources in order to ensure the eventual self-sustainability of AKHCP initiatives in terms of operational income, human resources and institutional management capabilities. Through this integrated approach, the Programme seeks to demonstrate that strengthening cultural identity can go hand in hand with socio-economic progress. AKHCP has completed projects in Mostar, Samarkand and Zanzibar, and is currently active in Aleppo and other sites in Syria, Cairo, Delhi, Herat and Kabul, sites in Mali and in Northern Pakistan (Hunza and Baltistan).

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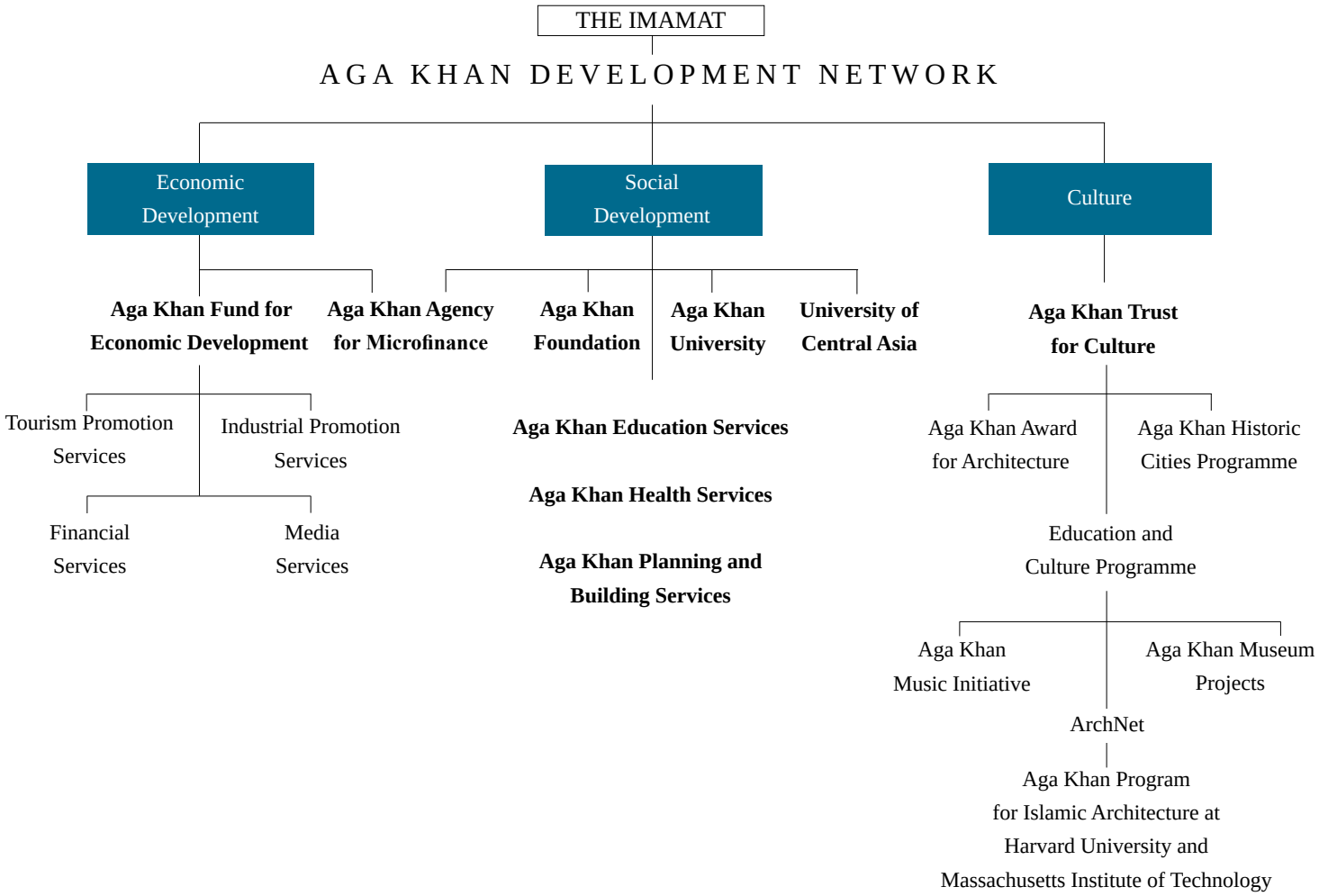
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