MISSIONARY HERITAGE HEALTHCARE BUILDINGS IN TRANSJORDAN, AT THE END OF THE OTTOMAN EMPIRE AND DURING THE EMIRATE PERIOD (1880-1946)¹

УДК 725.03(569.5) ББК 85.113(5Иор)

Dina Daoud, Jawdat AL-Goussous

University of Jordan, Amman, Jordan

Abstract

Western missionaries play an essential role in the development of the healthcare sector in Jordan by providing modern medical services, training specialist nurses and combating endemic diseases. The purpose of this research is to document five of the heritage healthcare buildings in Transjordan, which were founded by western missionaries at the end of the Ottoman Empire and during the Emirate period (1880-1946). The theoretical and historical background information was gathered from available resources and the common architectural elements were analyzed. These buildings have historical and cultural significance, in addition to its unified characteristics related to the local architecture.

Keywords: Healthcare Services, Heritage Healthcare Building, Missionary Hospitals, Transjordan

МИССИОНЕРСКОЕ НАСЛЕДИЕ В АРХИТЕКТУРЕ ЗДАНИЙ МЕДИЦИНСКИХ УЧРЕЖДЕНИЙ В ТРАНСИОРДАНИИ В КОНЦЕ ОСМАНСКОЙ ИМПЕРИИ В ПЕРИОД ЭМИРАТА (1880-1946гг.)

Dina Daoud, Jawdat AL-Goussous

Иорданский Университет, Амман, Иордания

Аннотация

Западные миссионеры сыграли существенную роль в развитии сферы здравоохранения в Иордании благодаря оказанию современных на тот период медицинских услуг, подготовке и обучению младшего медицинского персонала и борьбе с эндемическими заболеваниями. Целью данного исследования является документирование пяти исторических зданий учреждений здравоохранения в Трансиордании, которые были основаны западными миссионерами в конце Османской империи и в период эмирата (1880-1946гг.). Теоретическая и историческая справочная информация собрана из доступных источников. В статье проанализированы общие архитектурные элементы зданий медицинских учреждений. В дополнение к своим унифицированным характеристикам, связанным с местной архитектурой, эти здания имеют историческое и культурное значение.

Ключевые слова: услуги здравоохранения, исторические здания учреждений здравоохранения, миссионерские больницы, Трансиордания

¹ The article is published in the author's vocabulary.

Introduction

The development in healthcare services in Jordan can be traced back to 1883, when the Church Missionary Society (CMS) established a clinic in Al-salt city, which was enlarged in 1904 to become a hospital with a capacity of 11 beds. Hospitals and more clinics are built during the Emirate period (1921-1946).

The development in healthcare services continued to present time, while the healthcare sectors in Jordan become one of the highest quality healthcare services regionally, as well as being the top medical tourism destination in the Middle East and North Africa [19].

Medical services in Jordan were provided by five sectors: public (The Ministry of Health), semipublic, private, military (The Royal Medical Services (RMS)) and national agency (The United Nations Relief and Works Agency (UNRWA)).

The Ministry of Health provides its services in (677) medical centers and (31) hospitals with a capacity of (5998) beds, which distributed across the country. Jordan University Hospital (JUH) in Amman and King Abdullah University Hospital in Irbid are considered as semi-public hospitals with a capacity of (544) beds and (501) beds respectively. In 2015 the number of private hospitals rose to (61) hospitals and the total bed capacity rose to (4242) beds. The Royal Medical Services (RMS) provides its services to the employee of the Jordanian Armed Forces in (12) hospitals with a capacity of (2412) beds. (UNRWA) provides medical services to Palestinian refugees in (104) medical centers, which were founded on refugee campuses.

Purpose of the Research

Health care architecture is on a dynamic development as a result of multiple factors, for example, the changes in social and healing culture, medical knowledge, building technology, scientific achievement, pattern of health care utilization, and government policy (Sitdhiraksa 2011).

The purpose of this research is to document five of heritage healthcare buildings in Transjordan, which were founded by western missionaries at the end of the Ottoman Empire and during the Emirate period. Those heritage healthcare buildings are: The English Hospital in As-Salt, The Italian Hospital in Amman, The English Hospital in Amman (Which known now as Maternity and Childhood Training Center (Wadi Srour Health Center)), The Italian Hospital in Al-Karak and The Gilead Mission Hospital in Ajloun.

These heritage healthcare buildings represent the development in the health care sector in Jordan over the last decades.

Literature Review

Health Care Services in Transjordan at the End of the Ottoman Empire (1880-1916):

Transjordan was part of the Ottoman Empire from 1516 to 1916 (Al-Badayneh). During this period the people in Transjordan suffered from leakage in governmental health services, water pollution and increasing at the rate of Mortality and the number of people who infected with epidemic diseases.

Western missionaries played a vital role in introducing modern medical services to Jordanian society, training nurses and combating endemic diseases in addition to affording educational services and building their own churches and quarters (AI-Badayneh) (Shawash 2003).

Starting in the 1860s, French and Italian Catholics of the Patriarchate of Jerusalem and English Protestants of the Church Missionary Society began to establish missions in the villages to the East of the Jordan (Shawash 2003).

Church Missionary Society (CMS) started its medical services in 1883 by establishing a clinic in As Salt, which was enlarged to hospital in 1904. In 1896 (CMS) moved to Al-Karak and opened a new clinic there (Ziadat 1990).

Ottoman Military Hospital in Al-Karak is the first hospital in Transjordan, which was established in 1896. Another military hospital (Sikit Al-Haded hospital) was established in 1899.

Health Care Services in Transjordan during the Emirate Period (1921-1946):

According to Al-Badayneh, during the emirate period (1921-1946) hospitals can be categorized into three types: (1) Missionary hospitals, (2) Governmental Hospitals and (3) Private Hospitals.

Missionary Hospitals:

In 1927 (C.M.S.) started their services in Amman by opening a hospital for women, which known as The English Hospital or 'Essitt El-'Arja' hospital. The Italian Missionary Society (IMS) established two hospitals, one in Amman in 1927 with a capacity of 28 beds and another one in al-Karak in 1935 with a capacity of 25 beds. The Gilead Mission Hospital was another missionary hospital, which was founded by C.M.S in Ajloun in 1940.

Governmental Hospitals:

The governmental hospitals founded to provide protective and curative services. The first government hospital in Amman "Al-Baladiya hospital" was founded in 1920 to provide medical and surgical treatment. After it was closed another hospital was established in 1926 with a capacity of 20 beds.

Many Epidemic Diseases Hospitals were established in different districts in 1926 to control the spread of epidemic diseases. Four hospitals were founded in Amman, Irbid, AL-Karak and Ma'an with a capacity of 8 beds, in addition to two hospitals in Jarash and Aqaba with a capacity of 4 beds.

All pilgrims were vaccinated against certain diseases (i.e., cholera) in the one of a quarantine stations which were established in the Syrian border at Al Ramtha, at the Amman railway station or at the Ma'an railway station (Rogan And Tell 1994) (Al-Badayneh).

Six beds capacity hospital was founded in Central Jail in 1927 to provide medical services to prisoners. In the same year, government laboratory was established in Amman. In 1935, two hospitals started their medical services one in Irbid, another one in Al-Salalem in As Salt which was became the official hospital for the city instead of the English Hospital which converted to outpatient care clinics.

A new hospital was established at As Salt street in Amman and was named 'Al Ayni' Hospital, probably in honor of the famous "al-Qasr al-Ayni" Hospital of Cairo. It was completed in 1942 and inaugurated by Prince Abdullah himself (Shawash 2003). It was a major government hospital with a large number of clinics and basic facilities, including surgery, obstetrics, ophthalmology and emergency cases (Bakig, 2002). Later it was demolished to give space to the Central Bank of Jordan.

Private Hospitals:

There were three private hospitals were established during The Emirate Period:

- Ajloun National Hospital was established by Dr. Samman Khori in 1919.
- Sannial Hospital was founded by Indian doctor and its capacity was upgraded to 30 beds in 1927. In 1929 it was closed after the death of Sannial.

- Malhas Hospital was founded by Kassem Malhas in 1944.

Research Methodology

This research documented five of the missionary's heritage healthcare buildings in Transjordan (1880-1946). The theoretical and historical background information was gathered from available resources such as master's theses, published papers, books, historical photos and websites. Available old and new photos were used to analyze the architectural characteristics of the selected heritage buildings.

Case Studies

The Old English Hospital in As-Salt

The English Hospital in As-Salt was the first hospital to be built between Baghdad and the Mediterranean. The patients came to the hospital from far away country as Morocco, Yemen and Saudi Arabia.

In 1883 the Church Mission Society (CMS) started its medical services with simple facilities in a clinic in As Salt City. The construction of the ground floor was completed in 1889 as a part of English complex, located in the center of the old city of As-Salt and overlooking Al Ain Plaza. In 1904 the clinic evolved into a hospital with a capacity of (11) beds, which was enlarged in 1907 to (16). Dr. Charlotte Pernell was first gynecologist offered treatment to women twice a week in the English hospital in 1913.

The hospital deteriorated badly, during the First World War, when the Turkish Army used it. In 1922 after the Great Arab Revolt, His Majesty King Abdullah I, Prince of Transjordan at that time, funded the hospital expansion. The men's ward was added and a new floor was built as housing for doctors and nurses. Although the building was damaged in an earthquake in 1927, it continued to provide its medical services to patients. In 1935, when the new and well equipped hospital in Alsalalem was completed, the English hospital was converted to outpatient clinics. Between 1948 and 1982, the hospital building was used as a school and relief center by (UNRWA).

In 1982 it was closed until 1996 when the Holy Land Institute for the Deaf (HLID) established the Salt Training and Resource Institute for Disability, Etc (STRIDE) and began the rehabilitation of the complex in 1998 for eventual re-use as STRIDE's training, resource, and respite care center (Goussous 2008). The old hospital and a doctor's residence adjacent to the hospital were restored, renovated and some spaces were redesigned to be suited for people with physical disabilities and visual impairment. The training center included many facilities as a training room, a disabled living center, administrative hub, living quarters for trainees and others, small shops and all needed services.

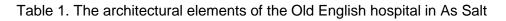
The English Hospital building is an example of heritage public building which was reused many times to reach the community's needs.

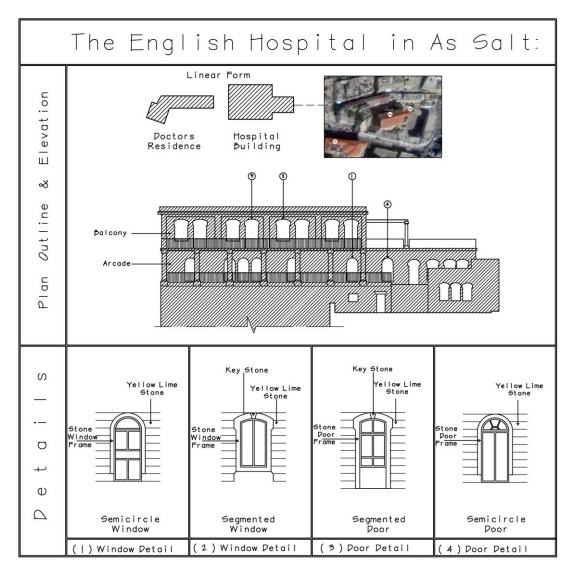
Architectural Characteristics:

The architectural style of the hospital building follows the regional style of the late Ottoman period (Figure 1). The local yellow stone was used to build the thick walls and steel I-beams were used for slabs. Additionally to a basement floor, the building consists of a two stores with large balconies. The opening frames are semicircle or segmented arches built of yellow limestone. The doors and windows frame are made of wood. The floor tiles are stone or terrazzo. These architectural elements are summarized in Table 1.



Fig. 1. General view of the Old English Hospital





The Italian Hospital in Amman (Al-Tuliani)

The Italian missionary society founded its first hospital in Amman in 1927. It's located at the foot of Al-Ashrafieh Mount, overlooking the Seil. The hospital still located on the same site and provides the medical services to local and poor people with low cost.

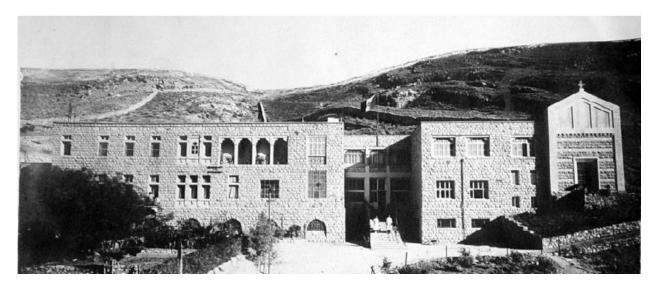


Fig. 2. The Italian hospital in Amman, picture taken in late 1920s (Source: The private collection of Mrs. Falvia Romero (the daughter of the founding physician)

The doctor Fausto Tizio came to Transjordan in 1921 and settled in As Salt city to establish a hospital there. Then he decided to find it in the selected capital of Transjordan Amman. The hospital and the doctor's small apartment were designed by Italian architect. During expansion of the city in downtown, houses were built around the hospital. Patients came to the hospital not only from Amman, but also from far away countries as Saudi Arabia.

British authorities took over the management of the hospital during World War II, Tizio and other Italian employees were expelled to Australia. When the war ended, King Abdullah I requested the British to bring doctor Tizio back to Transjordan. Tizio resumed work at the hospital for 20 years until retiring in Italy in 1966.

The capacity of the hospital was (28) beds, when it was founded in 1927. In 1930 the hospital was extended and its capacity rose to (40) beds. The number of beds was increased to (75) beds in 1940. Different architectural styles and stone types in hospital masses represent its development along the years.

In 1939 the Comboni sisters took the responsibility of the Italian Hospital in Amman until now. Eight Comboni sisters and (114) staff members work together to serve patients. In collaboration with Caritas, the hospital provides its services to Iraqi and Palestinian refugee in Amman.

Architectural Characteristics:

A two story flat roof building with a basement floor were constructed of rough and smoothed stone in some details. Reinforced concrete was used in entrance columns and beams and window lintel. Rooms arranged along double loaded corridor. The openings verify in there's type and height, forming a dynamic façade. These architectural elements were summarized in Table 2.

The Italian Hospital in Amman Linear Form evation ш Š Hospital Building Entrance Outline () Cond 3 Window Concrete Concrete ЧD Balcon D Concrete Pillars Pasement Window Iron Handrail S Smooth stone Key Stone Conci et Rough Rough Stone Ο Stone Rough Windo + Smoot Stone Rough Stone Rough Stone 4.4.4 Smooth Stone (1) Raised Semicircle \square Architraves Window (3) Window Detail (2) Archade Detail (|) Window Detail

Table 2. The architectural elements of the Italian hospital in Amman

The English Hospital in Amman 'Essitt El-'Arja Hospital'

The English hospital in Amman was established by (C.M.S.) in 1927. It was the first specialist hospital in Amman for women and children with a capacity of 20 beds. Dr. Charlotte Pernell took over administration of the hospital. In 1958 the hospital was converted to governmental maternity and childhood training center. The hospital located west and upstream of the Italian Hospital (Shawash 2003).

Today the hospital site includes two buildings, Maternity and Childhood Training Center (The Old English Hospital) and Maternity and Childhood Health Care Center, which was administered by The Ministry of Health.

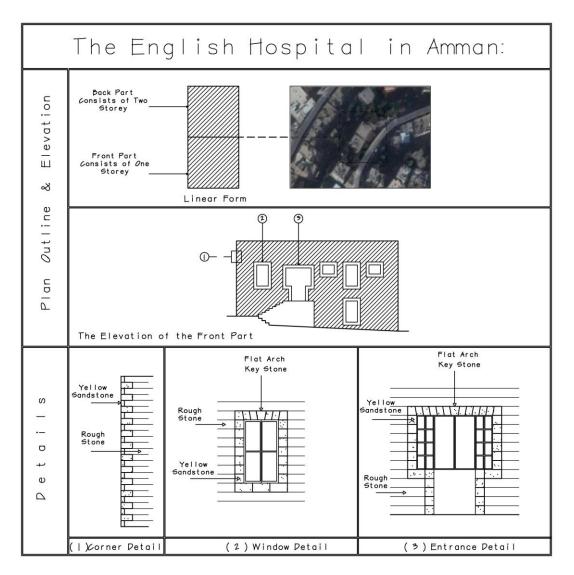
Architectural Characteristics:

The hospital display simplicity in its form and architectural elements (Figure 3). The openings were framed by yellow stone. Its plan consists of a narrow corridor with rooms flanking it on both sides (Shawash 2003). The hospital consists of a two storey with a basement floor below it. These architectural elements were summarized in (Table 3).



Fig. 3. Front elevation of the English Mission Hospital (Source: Shawash 2003)

Table 3. The architectural elements of the English hospital in Amman



The Italian Hospital in Al-Karak (First Hospital in South Jordan)

The hospital located at the north of the Karak Castle. It was established by the Italian Missionary Society in 1935, with a capacity of 25 beds.

The first medical services in the hospital concentrated on delivery services, which were provided by Dr.Kanouff, his wife and two nurses. By the time, the services in hospital were developed and the medical staff member now consists of Italian and Jordanian doctors in collaboration with Comboni sisters and Jordanian nurses.

From 1935-1939 the sisters of the child Mary were administering the hospital. After 1939 the Comboni Sisters are running the hospital [18].

Due to the increasing in population and needing of medical services, the hospital was restructured and upgraded in 1995 to improve the services offered to local people. The capacity of the hospital was increased to 38 beds, three surgery theaters and two delivery rooms. Today the hospital provides many medical services, such as emergency, x-rays, laboratories, pharmacy, delivery, incubators and operating theaters (general surgery, orthopedics, ear nose and throat and gynecology) [18].

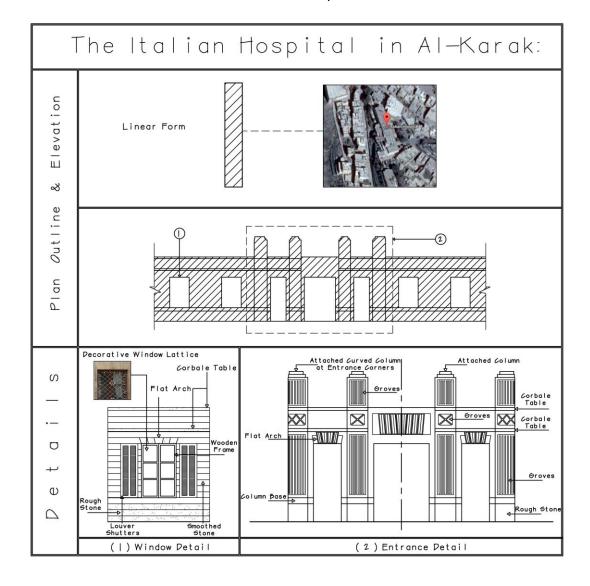
Architectural Characteristics:

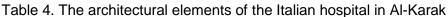
The hospital has a simple linear form with a double-loaded corridor. The openings are typical and the most impressive element is the entrance (Figure 4).



Table 4 represents the architectural elements of the Italian hospital in Al-Karak.

Fig. 4. Italian Hospital, Al Karak, (Left) side view of the main entrance, (Right) window detail topped with a flat arch and rusticated base (Source: Shawash J. (2003))





Gilead Mission Hospital in Ajloun

Gilead Mission Hospital (C.M.S.) started its medical services in Ajloun in 1938 by opening a clinic. Dr Charles McLean, his wife and Dr.Dorey came to Transjordan at the beginning of the thirties of the twentieth century to provide their missionary medical services in the English hospital in As Salt, and then they moved to Ajloun to open a clinic there. In 1940, the Gilead Mission Hospital was opened; it consisted of that had a total of 27 beds, and 16 employees (Figure 5).

Many difficulties were faced the medical staff as unavailability of electricity and continuous water source in addition to have one car for different hospital purposes.

Dr Charles McLean and his wife were facing a financial shortage because of inability of patients to pay the cost of treatment. McLean's wife funded the hospital from her own money for a couple of years. In 1951 the Head of the Foreign Missions Board of the Southern Baptists in the United States offered to assume the management of the hospital to serve the people in northern Jordan [20].



Fig. 5. Gilead Mission Hospital, Ajloun (Source: Library of Congress)

In 1952 the Baptists changed the name of the hospital to Baptist Hospital. After two years the Baptists built a new hospital building with a capacity of 50 beds (Figure 6).

After building a new hospital in 1974, the Baptist Hospital was re-used as a school for nursing, to providing the health sector with trained nurses, especially in the early years of the establishment of the state of Jordan [16]. In 1988, the Jordan Baptist Society converted it into a center to accommodate different Baptist meetings and conferences as well as other evangelical Christian meeting [17].



Fig. 6. Baptist Hospital built in 1952, which re-used later as a school for nursing (Source: Denomination Jordanian Baptist Church web site)

A new building was built in 1974 and inaugurated by His Majesty King Hussein bin Talal. This building was sold by the Jordanian Ministry of Health, they converted its name to The Hospital of Faith in honor of the great faith they saw in Christians who established it and worked in it [17]. The Hospital of Faith (AI- Eman Hospital) will be demolished to build a new modern hospital on its site (Figure 7).

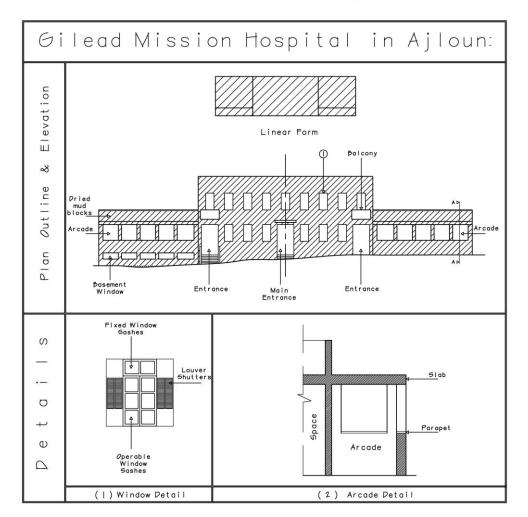


Fig. 7. New Baptist Hospital, which was built in 1974 (The Hospital of Faith) (Source: Denomination Jordanian Baptist Church web site)

Architectural Characteristics:

The hospital, which was constructed from concrete in 1940, consisted of a two storey with a basement floor below it. Rectangular openings with louver shutters were repeated along symmetrical façade. The architectural elements of the Gilead hospital in Ajloun were summarized in Table 5.

Table 5. The architectural elements of the Gilead Mission Hospital, Ajloun



Conclusion

The missionary hospitals in Transjordan at the end of the Ottoman Empire and during the Emirate Period (1880–1946) have historical and cultural significance. These buildings represent the first medical buildings in Transjordan, which had been continuously used and developed over the time. The missionary society, not only introduced a modern medical service to citizen, especially poor people, during a leakage of governmental medical services, but also provided the health sector with trained nurses. So these buildings represent an evidence of medical development in Jordan. Restoration and adaptive re-use of some of missionary hospital buildings demonstrated how heritage building can reach the modern community's needs.

Generally, the selected missionary healthcare buildings had some unified characteristics related to the local architecture (Table 6). Those buildings were distinguished by its simple shapes and using of local stone. Some of these buildings used a double loaded corridor to achieve functional requirements.

Stone is a local material which is widely available and affordable. So it was used for primary structural and decorative elements. A rough stone was used for general massing and smoothed stone for details.

Other materials as concrete was used shortly because it was imported from other countries and not manufactured locally at that time. For that, it had limited use in structural elements as column, beam, pillars and lintels (Table 2). The concrete block was not widely spread yet; instead dried mud blocks were preferred as a fill in and partitioning material [4]. Window frames, doors and shutters were wooden. Protective on window and handrails were made of iron (Figure 4). Semicircle, segmented, flat arch and simple rectangular opening with or without frame were used in these buildings. These architectural elements of the selected five hospitals were summarized in Table 6.

	The English Hospital in As Salt	The Italian Hospital in Amman	The English Hospital in Amman	The Italian Hospital in Al-Karak	Gilead Hospital in Ajloun
Form of Plan	Linegr Form	Lineor Form		Torm	L neat Form
Number of Floors	One storey building with a basement under it.	Two storey building with a basement under it	Two storey building with a basement under it	<i>O</i> ne storey building.	Two storey building with a basement under it.
Entrance	Semicircle door. Framed by yellow store.	Simple rectangular entrances With concrete columns and beam	Flat arch door Framed by yellow stone.	Entrance porch consists of four columns The openings topped with flat arch. Rough and smoothed Stone was used.	Simple rectargular entrances concrete canopy above main entrance.

Table 6. The main architectural elements of the selected hospitals

AMIT 3 (36) 2016

Windows	Semicircle ond segmented orch Framed by yellow stone	Segmented arch Simple rectangular	Flat arch Framed by yellow stone	Flat arch Louver shutters	Simple réctángular Louver Shutters
Exterior Finish	Yellow limestone	Rough stone	Rough and smoothed Store	Rough and smoothed Stone	Dried mud blocks

These hospitals shall be conserved and maintained because of its historical and cultural significance. Adding an extension to original buildings shall be studied carefully. The new extension shall be distinguished from old and be compatible with the original materials, architectural style and the massing size of the heritage building.

References

- 1. Al-Badayneh D., Patients' Satisfaction In Jordanian Hospitals, Unpublished Master Thesis, University of Mutah.
- Almatarneh, R. (2013), Energy-Efficient Building Design: towards climate-responsive architecture - A case study of As-Salt, Jordan, Advanced Research in Engineering Sciences "ARES", Vol. 1 (2) October 2013.
- 3. Bakig, Arslan Ramadan, 2002, Amman: A History with Pictures, Amman Municipality, Amman, Jordan.
- 4. Daoud, G. (1994), As Salt and Its Surrounding (1864-1921), Publications of Business Bank.
- 5. Goussous, J. (2008), Adaptive Re-Use of the Old Evangelical English Hospital in the Town of Salt, The Journal of Heritage Stewardship, Vol 5.number 2, September, 2008.
- 6. Hani, A. (2008), As-Salt, features of the daily life of the city through the municipal register for the years 1940-1941.
- 7. Luck, T. (2010), Old English Hospital poised to be centerpiece to Salt's tourism revival, Jordan Times, 4 June 2010.
- 8. Ma'aeta, S. S. (2006), Karak the Glory and History, Office of the sons of Karak Association.
- 9. Mousa, S, Amman the Capital of Jordan, publication of Amman municipality.
- 10. Rogan E. And Tell T. (1994), VILLAGE, Steppe And State; the Social Origins of Modern Jordan, British Academic Press.

- 11. Royal Scientific Society (1990), Architectural Heritage of The Hashemite Kingdom of Jordan: As-Salt City, Royal Scientific Society, Amman, Jordan.
- 12. Shawash J. (2003), Architecture In Amman During The Emirate Of Transjordan, 1921-1946, Unpublished Master Thesis, University of Jordan.
- 13. Sitdhiraksa, N. (2011), Conservation of Heritage Architecture: Case study At Siriraj Hospital, Bangkok Thailand, Unpublished Thesis, Silpakor University.
- 14. Statistic of Ministry of Health 2015.
- 15. Sulaiman, W. (2013), Rare Sight for Amman before (80) Years, Al-Rai Newspaper, 20, February, 2013.
- 16. Ziadat, A. (1990), "The formative years of hospitals and medical treatment in the East of Jordan", Yarmouk University Publications, Irbid, 1990.
- 17. Available at: http://www.ajlounbaptistcenter.com/#!abc-story/cmw8
- 18. Available at: http://combonisisters.tripod.com/kerakhospital a.html
- 19. Available at: <u>http://inform.gov.jo/en-us/By-Date/Report-Details/ArticleId/44/Jordanian-Health-Sector</u>
- 20. Available at: http://www.jordanbaptist.org/#!history/c1ger
- 21. Available at: http://www.loc.gov/pictures/
- 22. Available at: https://www.nps.gov/tps/how-to-preserve/briefs/14-exterior-additions.html

DATA ABOUT THE AUTHORS

Dina Daoud

Graduate Student, Department of Architecture, Faculty of Engineering & Technology, University of Jordan, Amman, Jordan e-mail: <u>dina_daoud2013@yahoo.com</u>

Jawdat Goussous

PhD Architecture, Department of Architecture, Faculty of Engineering & Technology, University of Jordan, Amman, Jordan e-mail: jawdatgoussous@hotnmail.com