Site Visit Report Form FTR # 383 QR

A. BASIC DATA

(Trigon staff shall complete this field trip report within 48 hours after returning from the field and ensure that it is sent properly distributed within 72 hours after leaving the construction site)

Program (JSEP or SKEP): SKEP III Package 1
School Name: Khadija Bint Khwailed Basic Mixed
Supervisory Engineer (SE): Medanat Consultant Engineers
Construction Contractor (CC): Derar Al Saraireh & Sons
Date and Time of Field Trip: May 19th, 2021
Date of Report: May 23rd, 2021
Weather During Visit: Sunny 32°
Prepared By: Abedalaziz Abu wandi CMTO/Trigon
Submitted By: Osama Obeid CMTO/Trigon

Purpose of Visit

General Site Inspection (Quality)
Corrective Action (CA) Review Report
Health, Safety & Environment (HSE)
Site Meeting
Substantial Completion Inspection
First Hand-over Inspection
Second Hand-over Inspection
OTHER (list below)

Personnel on Trip

No.	Name	Title	Agency
1	Abedalaziz Abu wandi	Civil Engineer	Trigon
2	Odai Tawalbeh	H&S Engineer	Trigon

Personnel at Site *(if a site meeting or a final inspection, use attachment to list other participants)*

No.	Name	Title	Agency
1	Mahmood Maghnam	Package Manager	Medanat
2	Taher Al Rebei	Site Engineer	Medanat
3	Abdullah Al Zu'bi	H&S Engineer	Medanat
4	Khaled Al Jahalein	Fresh Grad Engineer	Medanat
5	Khaled Bazian	Project Manager	Derar Saraireh & Sons
6	Anas Shdeifat	Site Manager	Derar Saraireh & Sons
7	Anas Omran	H&S Engineer	Derar Saraireh & Sons
8	Ahmad Al Nawaji	Tech. Supervisor	Derar Saraireh & Sons

B. QUALITY, SCHEDULE AND H&S FINDINGS CHECKLIST

(For any "No" answer in this section, the Observer shall provide a narrative explanation in Section C. of this Report including corrective action requested) ***NA-Not Applicable, DC-Didn't Check***

		Construction Contractor	Supervisory Engineer
A.	**Site Documentation**		
1.	Drawings and Specifications on site? (Y/N)	Y	Y
2.	CC Safety Plan on site? (Y/N)	Y	Y
3.	CC QC Plan on site? (Y/N)	Y	Y
4.	Shop Drawings up to date? (Y/N)	Y	Y
5.	Request for Information/Inspection up to date? (Y/N)	Y	Y
6.	Sampling and Testing Tracking Log? (Y/N)	Y	Y
7.	Hard copy files neat and up to date? (Y/N)	Y	Y
8.	Inspector's Daily Journal up to date? (Y/N)	Y	Y
9.	Non-Conformance Report up to date? (Y/N)	Y	Y
B.	**Schedule**		
10.	SE has up to date CC Schedule on site? (Y/N)		Y
11.	CC has up to date CC Schedule on site? (Y/N)	Y	
C.	**Exit Observation**		
12.	What time does CC start work each morning on average?	7 a.m	
13.	What time does CC stop work each day on average?	5 p.m	
14.	What is the average # of working hours each day?	9 hrs	

C. DESCRIPTION OF FINDINGS

(State if fact or opinion. Use attachments, maps, sketches if necessary)

A. **Site Documentation**

1. All documentations are available onsite and neatly saved.

B. **Health, Safety & Environment (HSE)**

1. Site is well gated and secured,
2. All workers had a full PPE gear on.

C. **General Quality Observations**

1. One casted column was found seriously out of plumb and twisted, the plumb test showed a horizontal difference of 4-5 cm in a 3.5 m column, this column must be replaced/rectified,
2. Percentage of segregation in the new constructed elements are decreasing as better framework shuttering methods and materials are used, it can stand harder concrete vibrating,
3. Basecourse fill materials are continually failing compaction test, which is leading to significant delays on constructing the SOG and the following works for a considerable section of the site.

D. **Schedule**

1. According to Medanat, physical progress has reached 22%, while planned progress is 26%,
2. The negative progress variance is caused from the delay in construction the boundary wall section adjacent to the neighbors building and the failing compaction tests of the basecourse fill material under the SOG for a section of the building,
3. The average number of labors working daily on site in the past week is 26.

E. **Status of Utility connections / other outstanding issue**

1. **Water Supply**: Water Tank is constructed- Not Connected
2. **Wastewater**: Septic Tank is constructed
3. **Electricity**: Not Connected
4. **Other Issue**:

ATTACHMENTS – as marked below

1. QUALITY CHECKLIST
2. MEETINGS / INSPECTION MINUTES
3. HEALTH, SAFETY & EVIRONMENT ATTACHMENT

E. PHOTOS


USAID
SCHOOLS FOR KNOWLEDGE ECONOMY PROJECT
Phase 3 / Package 1
Khadija Bint Khwailed Basic Mixed School
مشروع مدارس الاقتصاد المعرفي
المرحلة الثالثة / الحزمة الاولى
مدرسة خديجة بنت خويلد الاساسية المختلطة
Owner :
Ministry Of Education
المالك:
وزارة التربية والتعليم
Employer :
Ministry Of Public Works And Housing
صاحب العمل:
وزارة الاشغال العامة والاسكان
Financier :
United States Agency For International Development (USAID)
تمويل:
الوكالة الامريكية للتنمية الدولية (USAID)
Designer :
Engicon
تصميم:
شركة المستشار للهندسة
Consultant :
Wahib Medanat Consultant Engineers
الاستشاري:
وهيب مدانات مهندسون مستشارون
Contractor :
Derar Saraireh & Sons For Engineering and Contracting
المقاول:
شركة ضرار الصرايرة واولاده للهندسة والتعهدات
Contract Number : 1/2020/USAID/SKEP/3/1
رقم العطاء:
Duration Of Contract : 450 days
مدة المشروع : ٤٥٠ يوما

The new School will be a 5362 sq.m, 4-storey building and will consist of 22 classrooms, 4 KGs and 1 for special need. The school will service up to 928 Students, starting from KG2 to 10th grade

Photo Credit: May 19th, 2021 Abedalaziz Abu Wandi , Civil Engineer, CMTO/Trigon

Figure 1&2 : Construction site and main ongoing activities

Neighbors encroaching boundary wall issue is solved and the Contractor started the Boundary wall Construction

Photo Credit: May 19th, 2021 Abedalaziz Abu Wandi , Civil Engineer, CMTO/Trigon

Figure 3: Neighbour's Boundary Wall

Water and Septic tanks are constructed and are being waterproofed.

Photo Credit: May 19th, 2021 Abedalaziz Abu Wandi , Civil Engineer, CMTO/Trigon

Figure 4: Water & Septic Tanks

Figures 5 & 6

Reinforcement steel fixing and frameworks shuttering works are ongoing at section B.

Photo Credit: May 19th, 2021 Abedalaziz Abu Wandi , Civil Engineer, CMTO/Trigon

Figure 5: Section B is Progressing Ahead of the Other Building Sections

Figure 6: Preparing Columns of First floor

Column on the ground floor was found seriously out of plumb, the horizontal difference between the top of the column and the bottom is 4-5 cm, which is clearly out of allowable tolerances. The SE were asked to investigate the plumbness of this element and hold placing concrete in the columns above it.

Photo Credit: May 19th, 2021 Abedalaziz Abu Wandi , Civil Engineer, CMTO/Trigon

Figure 7: Measuring Column plumbness

The sections showed in the figure are not progressing due to the continually failing compaction tests of the fill materials under the SOG. This case has been ongoing for the 4 weeks and it is causing delays to the schedule

Photo Credit: May 19th, 2021 Abedalaziz Abu Wandi , Civil Engineer, CMTO/Trigon

Figure 8: Unprogressive Construction Sections

Better quality of placing concrete was noticed during this visit, however minimal amount of segregation was observed

Photo Credit: May 19th, 2021 Abedalaziz Abu Wandi , Civil Engineer, CMTO/Trigon

Figure 9: Concrete Segregation

Trigon Quality Field Trip Report Attachment #1

Notes:

Date:	Wednesday, May 19, 2021
School Name:	Khadija Bint Khwailed Basic Mixed
Location:	Al Balqa
Program / Phase / Package	SKEP III Package 1
Prepared by:	Abedalaziz Abu wandi CMTO/Trigon

#	Task / Activity	Observ-ations (Y/N)	Findings	Recommendations / Corrective Actions
A. Excavation				
B. Backfilling		Y	Fill Material Failing Compaction Tests	Better Quality of Material and Compaction Methods to be Used
C. SubStructural, Concrete,Foundations				
1	Steel Bar			
2	Footings			
3	Ground beams			
4	Tie beams			
5	Column neck			
6	Column			
7	waterproofing(Insulation)			
8	Slab on grade			
D. SuperStructural, Concrete,Masonry works				
1	Columns	Y	Verticality problem / Out of Plumb	Must Be Replaced/Rectified
2	Beams			
3	Slabs			
4	Roof			
5	Hollow Concrete Block (internal)			
6	Hollow Concrete Block (external)			
7	C-Channel			
8	Clading Natural Stones			
9	Electrical conuits/ sleeves			
10	Mechnical pipes/sleeves			
E. Civil Works				
1	Access /Gates			
2	Steel Doors			
3	Wooden Doors			
4	Door's accessories			
5	Aluminum Windows			
6	Window screen			
7	Steel protection			
8	Granite sill for window			
9	Plastering (Internal)			
10	Plastering (External)			
11	Wall Paint			
12	Ceiling Paint			
13	Wall tiles			
14	Floor tiles (Internal)			
15	External Floor tiles (Interlock /Stone)			

#	Task / Activity	Observ-ations (Y/N)	Findings	Recommendations / Corrective Actions
17	Facades, Roof parapet			
18	Lab Furniture			
19	Ceiling and roof system			
20	Acoustic Ceiling			
21	Facades, Roof parapet			
22	PVC			
23	Carpenting			
24	Expansion joint			
25	Roof insulation (waterproofing membrane)			
26	Flashing 10 cm			
27	Cold Fluid applied for boundary walls and septic tank			
F. Electrical Works				
1	Wiring - condiuts			
2	Electrical sockets			
3	Lighting fixtures			
4	Electrical Distribution Board			
5	Fire Alarm System			
6	Public Address			
7	Air Conditioning Units			
8	CCTV			
9	Manhole			
10	Electrical Earthing			
11	Wall Fan			
12	Elevator			
13	Electrical Room			
G. Mechanical Works				
1	Rest Rooms, Toilets, WC			
2	Wash basin			
3	Wall tiles			
4	Floor tiles			
5	Water Mixer			
6	Water Cooler			
7	Water Tank			
8	Boiler			
9	Heat Radiator			
10	Pump			
11	HVAC System			
12	AC unit/ Split Units(Wall mounted)			
13	Pump			
14	Drainage			
15	Submersible pump sets.			
16	Manholes, Clean-outs			
17	Fire Extinguisher			
18	Fire hose cabient			
19	Ventilation, AC Duct			
20	Emergency shower			
21	Septic Tank			
H. External Works				
1	Boundary walls	Y	Segregation Observed	Treated with Accepted Materials
2	C-Channel Finishings			

#	Task / Activity	Observ-ations (Y/N)	Findings	Recommendations / Corrective Actions
3	Fence			
4	Epoxy paint			
5	Landscaping			
6	External Paint			
7	Football/ Basketball Playground			
8	Sand playground for KG			
9	Plants area			
10	Car Park/Asphalt			

***Disclaimer**: Trigon field trip reports include information and findings based upon those parts of the construction sites we visit. Our visits and our contract scope of work do not include Trigon to carry out first tier Quality Control/Assurance, i.e., reviewing submittals, drawings and specifications, reviewing contract compliance, or in any way carrying out close supervision of the works. Therefore our field-trip reports include cursory quality, health & safety and schedule information and its entry on our reports is intended to provide the reader only with a sense of our general observations of that part of the job site we have visited*

CMTO Quality/Workmanship FTR Attachment #2

Construction Quality is carrying out work according to the Drawings and Specifications - Yes/No. This is the duty of the Contractor and the Supervisory Engineer. Quality Assurance (QA) is a check to ensure that the Contractor and Supervisory Engineer is working according to the Drawings and Specifications and observing and reporting generally on basic ongoing and/or completed construction workmanship and work quality. This report is a QA report and as such is an observational view of Contractor and Supervisory Engineer overall Quality Control management.

Date / Time of Field Trip: 19-5-2021
School Name: Khadija Bint Khwailed Basic Mixed
Location: Al Balqa
Program/Phase/Package: SKEP III/1
Name of Contractor : Derar Saraireh & Sons
Name of Sup. Engineer: Medanat
Prepared by: Abedalaziz Abu wandi CMTO/Trigon

1. GRADE KEY (Quality Observations)

3 Very Good
2 Acceptable
1 Poor

2. General Observations : (Yes = 2 / No = 1)

#	General QC Management Observations (33% of Grade)	STATUS	GRADE
1	QC Plan Approved By Supervising Engineer	Yes	2
2	QC Plan on-Site and Used by Construction Contractor	Yes	2
3	Approved Schedule On Site	Yes	2
4	Approved Shop Drawings On Site	Yes	2
5	Approved Material Submittals On Site	Yes	2
6	Material Acceptance/Rejection Forms Used On Site	Yes	2
7	Material Acceptance/Rejection Tracking Log in Monthly Report	Yes	2
8	Hard Copy Drawings/Specifications On Site	Yes	2
9	Hard Copy Drawings Marked Up Daily to Be As-Built	Yes	2
10	Supervisory Engineer Has and Uses Specification Testing Plan	Yes	2
	Sub-Total	**100%**	**20**

#	Activity Quality/Workmanship Observations (67% of Grade)	STATUS	GRADE
1	Excavation and Backfilling Works	Acceptable	2
2	Reinforced Concrete (forming, steel, placing, final result, curing)	Acceptable	2
3	External Wall Façade		-
4	Floor Tiles Installation		-
5	Internal Plastering		-
6	External Plastering		-
7	Doors		-
8	Windows		-
9	Internal Painting		-
10	External Painting		-
11	Mechanical and Plumbing (HVAC, Water Supply, Wastewater)		-
12	Electrical Works		-
13	Elevator		-
14	Internal Wall Tiling		-
15	Roof Waterproof Membrane		-
16	Site Works		-
17	Protection of Completed Works		-
18	Post Construction Cleaning		-
	Sub-Total	**67%**	**4**
	Quality Indicator Grade %	**78%**	

NOTES

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2
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