PRICED BILL OF QUANTITIES

FOR THE PERFORMANCE OF ARCHITECTURAL AND CONSTRUCTION WORK
ON THE FLOOD DAMAGE REMOVAL
THROUGH REHABILITATION and ADAPTATION PROJECT
OF THE GRAMMAR SCHOOL BUILDING

INVESTOR: "Svilajnac" High School in Svilajnac

BUILDING: Grammar School

No	Work Description	UoM	Quantity	UoM Price	Amount
0	**Dismantling and Demolition Work and Preparatory Work**				
0.1	Dismounting of existing wooden twin double arched windows consisting of ten panes, total dim 120/215cm. Calculated per piece, the price shall include rubble transportation to a landfill up to 10km away.	*pcs.*	37.00		
0.2	Dismounting of existing wooden twin single arched windows consisting of one pane, total dim 120/85cm. Calculated per piece, the price shall include rubble transportation to a landfill up to 10km away.	*pcs.*	2.00		
0.3	Dismounting of existing wooden twin double arched windows consisting of four panes, total dim 160/215cm. Calculated per piece, the price shall include rubble transportation to a landfill up to 10km away.	*pcs.*	10.00		
0.4	Dismounting of existing wooden twin double arched windows consisting of one pane, total dim 72/240cm and 56/85cm. Calculated per piece, the price shall include rubble transportation to a landfill up to 10km away.	*pcs.*	8.00		
0.5	Dismounting of existing wooden double door consisting of ten panes, total dim 160/305cm (2 pcs) and 120/365cm (1pc). Calculated per piece, the price shall include rubble transportation to a landfill up to 10km away.	*pcs.*	3.00		
0.6	Dismounting of old beaver tail roof cover, all chimney flashings and ventilation ducts, gutters, spouts, valleys, apron flashing etc. Dismounting of the existing lightning rod roof installation. Calculated per m2 of the inclined roof surface, the price shall include rubble transportation to a landfill up to 10km away	m^2	623.20		
0.7	Dismounting of the existing roof cover made of asbestos tiles over the entrance; dismounting of roofing battens and timber; dismounting of gutters and spouts, flashings and eaves wooden cladding. Calculated per m2 of the inclined roof surface, the price shall include rubble transportation to a landfill up to 10km away	m^2	71.00		
0.8	Dismounting of double plywood coated interior doors of various dimensions (door posts remain untouched). Calculated per piece, the price shall include rubble transportation to a landfill up to 10km away	*pcs.*	34.00		

No	Work Description	UoM	Quantity	UoM Price	Amount
0.9	Dismounting of existing indoor wall veneered chipboard cladding. Calculated per m2 complete with rubble transportation to a landfill up to 10km away.	*m2*	50.00		
0.10	Dismounting of existing roofing battens. Calculated per m2 of the inclined roof surface with rubble transportation to a landfill up to 10km away.	*m2*	623.20		
0.11	Dismounting of existing vertical concrete elements in the attic, cca 0.5m1. Calculated per piece	*pcs.*	2.00		
0.12	Rubble clearance from the attic before laying thermal insulation, rubble transportation up to 10km away. Calculated in lump.	*pcs.*	1.00		
0.13	Dismounting of damaged vinyl tile existing store room floors, rubble transportation to a landfill up to 10km away. Calculated per m2	*m2*	31.00		
0.14	Clearing the area under the stairs from sundry leftover rubble to access the moisture rehabilitation operating area. Calculated in lump	*pcs.*	1.00		
0.15	Chiselling moist and moulding mortar from a part of indoor walls for the purpose of moisture elimination, with joint clearing across the operating area. Calculated per m2	*m2*	20.20		
0.16	Artificial accelerated moisture removal from the walls (using dryers). Calculated per hour	*h*	20.00		
	Total - Dismantling and Demolition Work and Preparatory Work				

1 Doors and Windows

1.1	Procurement and mounting of twin double arched windows made of glued fir wood bits (or solid wood strips); the window frames shall not be thinner than 70-90mm and shall be protected with stained impregnation coats and water-based varnish. The windows shall be sealed with a minimum of two sealing rubbers, glazed with minimum double low-emission glass 4+15+4mm filled with argon. The windows shall consist of ten panes with total dimensions 120/215cm and shall be mounted according to instructions from the Institute for the Protection of Cultural Monuments. An anodized drip cap shall be fitted on the lower end of the window; the fittings shall be turn-and-tilt and of high quality. Calculated per piece, the price shall include mounting indoor parapet aluminium boards, approx. 20cm wide. Total window heat transfer coefficient shall be equivalent or smaller than 1.5W/m2K. Window posts shall be 15cm wide. Item II from joinery sketches.	*pcs.*	37.00		

No	Work Description	UoM	Quantity	UoM Price	Amount
1.2	Procurement and mounting of twin single arched windows made of glued fir wood bits (or solid wood strips); the window frames shall not be thinner than 70-90mm and shall be protected with stained impregnation coats and water-based varnish. The windows shall be sealed with a minimum of two sealing rubbers, glazed with minimum double low-emission glass 4+15+4mm filled with argon. The windows shall consist of four panes with total dimensions 120/85cm and shall be mounted according to instructions from the Institute for the Protection of Cultural Monuments. An anodized drip cap shall be fitted on the lower end of the window; the fittings shall be turn-and-tilt and of high quality. Calculated per piece, the price shall include mounting indoor parapet aluminium boards, approx. 20cm wide. Total window heat transfer coefficient shall be equivalent or smaller than 1.5W/m2K. Window posts shall be 15cm wide. Item IV from joinery sketches.	*pcs.*	2.00		
1.3	Procurement and mounting of twin double arched windows made of glued fir wood bits (or solid wood strips); the window frames shall not be thinner than 70-90mm and shall be protected with stained impregnation coats and water-based varnish. The windows shall be sealed with a minimum of two sealing rubbers, glazed with minimum double low-emission glass 4+15+4mm filled with argon. The windows shall consist of four panes with total dimensions 160/215cm and shall be mounted according to instructions from the Institute for the Protection of Cultural Monuments. An anodized drip cap shall be fitted on the lower end of the window; the fittings shall be turn-and-tilt and of high quality. Calculated per piece, the price shall include mounting indoor parapet aluminium boards, approx. 20cm wide. Total window heat transfer coefficient shall be equivalent or smaller than 1.5W/m2K. Window posts shall be 15cm wide. Item III from joinery sketches.	*pcs.*	10.00		
1.4	Procurement and mounting of twin double arched windows made of glued fir wood bits (or solid wood strips); the window frames shall not be thinner than 70-90mm and shall be protected with stained impregnation coats and water-based varnish. The windows shall be sealed with a minimum of two sealing rubbers, glazed with minimum double low-emission glass 4+15+4mm filled with argon. The windows shall consist of panes with total dimensions 72/240m and shall be mounted according to instructions from the Institute for the Protection of Cultural Monuments. An anodized drip cap shall be fitted on the lower end of the window; the fittings shall be turn-and-tilt and of high quality. Calculated per piece, the price shall include mounting indoor parapet aluminium boards, approx. 20cm wide. Total window heat transfer coefficient shall be equivalent or smaller than 1.5W/m2K. Window posts shall be 15cm wide. Item 1 from joinery sketches.	*pcs.*	6.00		

No	Work Description	UoM	Quantity	UoM Price	Amount
1.5	Procurement and mounting of twin double arched windows made of glued fir wood bits (or solid wood strips); the window frames shall not be thinner than 70-90mm and shall be protected with stained impregnation coats and water-based varnish. The windows shall be sealed with a minimum of two sealing rubbers, glazed with minimum double low-emission glass 4+15+4mm filled with argon. The windows shall consist of panes with total dimensions 56/85cm and shall be mounted according to instructions from the Institute for the Protection of Cultural Monuments. An anodized drip cap shall be fitted on the lower end of the window; the fittings shall be turn-and-tilt and of high quality. Calculated per piece, the price shall include mounting indoor parapet aluminium boards, approx. 20cm wide. Total window heat transfer coefficient shall be equivalent or smaller than 1.5W/m2K. Window posts shall be 15cm wide. Item V from joinery sketches.	*pcs.*	2.00		
1.6	Procurement and mounting of glazed double arched entrance door made of glued fir wood bits (or solid wood strips); the window frames shall not be thinner than 70-90mm and shall be protected with stained impregnation coats and water-based varnish. The windows shall be sealed with a minimum of two sealing rubbers, glazed with minimum double low-emission glass 4+15+4mm filled with argon. The door shall have a transom with total dimensions 120/365cm and shall be mounted according to instructions from the Institute for the Protection of Cultural Monuments. The fittings shall be of high quality. Calculated per piece. Total window heat transfer coefficient shall be equivalent or smaller than 1.5W/m2K. Window posts shall be 15cm wide. Item 2 from joinery sketches.	*pcs.*	1.00		
1.7	Procurement and mounting of glazed double arched entrance door made of glued fir wood bits (or solid wood strips); the window frames shall not be thinner than 70-90mm and shall be protected with stained impregnation coats and water-based varnish. The windows shall be sealed with a minimum of two sealing rubbers, glazed with minimum double low-emission glass 4+15+4mm filled with argon. The door shall have a transom with total dimensions 160/305cm and shall be mounted according to instructions from the Institute for the Protection of Cultural Monuments. The fittings shall be of high quality. Calculated per piece. Total window heat transfer coefficient shall be equivalent or smaller than 1.5W/m2K. Window posts shall be 15cm wide. Item 1 from joinery sketches.	*pcs.*	2.00		
1.8	Procurement and mounting of facade-mount window aluminium sill, approx. 20cm wide, on all openings and in walled windows on the side of the building. Calculated per m1.	*m*	89.60		
1.9	Procurement and mounting of interior door panes without door posts, made of fibreboard coated with PVC foil in wood colour; dimensions shall be 101/204cm together with all necessary fittings. Calculated per piece	*pcs.*	12.00		

No	Work Description	UoM	Quantity	UoM Price	Amount
1.10	Procurement and mounting of interior door panes without door posts, made of fibreboard coated with PVC foil in wood colour; dimensions shall be 91/204cm together with lock, knob, sealing rubber and 3 hinges. Calculated per piece	*pcs.*	5.00		
1.11	Procurement and mounting of interior door panes without door posts, made of fibreboard coated with PVC foil in wood colour; dimensions shall be 81/204cm and 86/204cm together with lock, knob, sealing rubber and 3 hinges. Calculated per piece	*pcs.*	4.00		
1.12	Procurement and mounting of interior door panes without door posts, made of fibreboard coated with PVC foil in wood colour; dimensions shall be 71/204cm together with lock, knob, sealing rubber and 3 hinges. Calculated per piece	*pcs.*	13.00		
	Total - Doors and Windows				

2 Brickwork and Concrete Work

2.1	Procurement of materials and plastering around all openings that are being mounted, from the outside and inside, with skim coating and painting jambs in the width of 20cm around all windows and doors. Calculated per m1 of opening.	*m*	400.00		
2.2	Concreting the plateau and walkways with 12cm thick MB25 concrete over the existing cracked concrete. Calculated per m2	*m2*	665.20		
2.3	Concreting the pavement 12cm thick MB25 concrete over the existing cracked pavement. Calculated per m2	*m2*	38.80		
2.4	Partially fixing existing chimneys and concreting chimney rings with MB20 concrete in formwork. Calculated per piece	*pcs.*	6.00		
2.5	Procurement of materials and plastering walls in lime plaster with added s/n bond additive. Calculated per m2	*m2*	20.20		
	Total - Brickwork and Concrete Work				

No	Work Description	UoM	Quantity	UoM Price	Amount

3 Façade Work

3.1	Cleaning the old facade and plinth by stripping old cracked plaster from all damaged parts of the plasterwork and Hirofa; washing with water under pressure until solid base to provide a solid sublayer for the new facade. Calculated per m2	*m2*	920.00		
3.2	Manufactrure of the facade and plinth and painting the facade with waterproof vapour permeable paint, according to instructions from the Institute for the Protection of Cultural Monuments, after having completed repairs on the cracked and damaged parts. The entire facade surface shall be calculated in m2. On-site verification shall be mandatory.	*m 2*	920.00		
3.3	Procurement of materials and flashing the entrance eaves with wood strips stained with two coats of Sadolin in a shade as instructed by the Institute for the Protection of Cultural Monuments. Calculated per m2	*m2*	15.00		
3.4	Mounting and dismounting of tubular scaffolding. Calculated per m2.	*m 2*	530.00		
3.5	Grinding the existing cast terrazzo on the entrance staircase and polishing it with adequate polishing paste. Calculated per m2	*m2*	8.00		
	Total - Façade Work				

4 Carpentry Work

4.1	Procurement of materials and manufacture of roof structure complete with battens and counter battens, with the aim of covering with new beaver tail tiles. Calculated per m2 of the inclined surface.	*m2*	71.00		
4.2	Procurement and mounting of battens and counter battens 3/5 for a simple beaver tail tile bond. Calculated per m2 of the inclined surface.	*m2*	623.20		
4.3	Boarding up the roof structure using 11mm thick OSB panels. Calculated per m2	*m2*	694.20		
	Total - Carpentry Work				

5 Roofing Work

5.1	Procurement of materials and simple roof cover using new beaver tail tiles, complete with entranceway. Calculated per m2 of the inclined roof surface.	*m 2*	694.20		
5.2	Procurement of materials and mounting adequate ridge tiles. Calculated per m1.	*m*	67.00		
	Total - Roofing Work				

6 Sheet Metal Work

6.1	Procurement and mounting of vent heads made of copper-coloured 0.55mm plasticized sheet metal, minimum 80cm above the roof plane. Calculated per piece.	*pcs.*	4.00		

No	Work Description	UoM	Quantity	UoM Price	Amount
6.2	Procurement of materials and mounting of chimney flashings made of copper-coloured 0.55mm plasticized sheet metal, SW 50cm. Calculated per piece	*pcs.*	6.00		
6.3	Procurement of materials and mounting of apron flashing made of copper-coloured 0.55mm plasticized sheet metal and over the ridge, SW up to 1.0m. Calculated per m1.	*m 1*	96.20		
6.4	Procurement of materials and mounting of horizontal gutters, SW 60cm, made of copper-coloured 0.55mm plasticized sheet metal. Calculated per m1.	*m 1*	96.20		
6.5	Procurement of materials and mounting of valleys and strips made of of copper-coloured 0.55mm plasticized sheet metal, SW 30 and 40cm. Calculated per m1	*m 1*	25.00		
6.6	Procurement and mounting of sheet metal to suspend the copper-coloured 0.55mm plasticized sheet metal gutter, SW 25cm. Calculated per m1	*m 1*	111.20		
6.7	Procurement of materials and mounting of spouts, SW 60cm, made of copper-coloured 0.55mm plasticized sheet metal. Calculated per m1	*m 1*	46.00		
6.8	Procurement of materials and mounting of horizontal gutters, SW 40cm, made of copper-coloured 0.55mm plasticized sheet metal. Calculated per m1 (entrance)	*m 1*	15.00		
6.9	Procurement of materials and mounting of valleys made of copper-coloured 0.55mm plasticized sheet metal, SW 30cm. Calculated per m1 (entrance)	*m 1*	11.00		
6.10	Procurement and mounting of edge flashings, SW 30cm, made of copper-coloured 0.55mm plasticized sheet metal (entrance). Calculated per m1	*m 1*	11.00		
6.11	Procurement of materials and mounting of facade horizontal decorative profile drip cap made of copper-coloured 0.55mm plasticized sheet metal, SW 30cm. Calculated per m1	*m 1*	96.20		
6.12	Procurement and mounting of chimney caps made of steel sheet metal for chimney dimensions of 40/50cm. Calculated per piece	*pcs.*	6.00		
	Total - Sheet Metal Work				

7 Weatherproofing

7.1	Procurement and mounting of 5cm thick hard sandwiched terwool as follows: aluminium foil type ISOFLEX or similar on the top and vapour permeable, watertight roofing foil type MASTERMAX D140 or similar under the terwool, over the floor structure to the attic. Calculated per m2.	*m2*	524.43		
7.2	Procurement and mounting of vapour permeable, watertight roofing foil. Calculated per m2	*m2*	694.20		
7.3	Moisture rehabilitation from the foundations by injecting chemical compounds (Sika and similar) in two horizontal rows, recessed. Calculated per m1.	*m*	9.20		
	Total - Weatherproofing				

8 Paint Work

No	Work Description	UoM	Quantity	UoM Price	Amount
8.1	Procurement of materials and painting walls and ceilings in two coats of emulsion paint with previous partial wall repair; the paint job shall be done in a colour designated by the Investor. Calculated per m2	*m2*	1,577.00		
8.2	Procurement of materials and painting existing wooden door posts with two coats of wood paint. Calculated per door.	*pcs.*	34.00		
8.3	Procurement of materials, two coats of skim coating and painting walls in two coats of emulsion paint on newly plastered surfaces, in a colour designated by the Investor. Calculated per m2	*m2*	20.20		
	Total - Paint Work				

No	Work Description	UoM	Quantity	UoM Price	Amount

9 Sanitation Blocks

9.1	Dismounting of washbasins (6 pcs) in sanitation blocks, toilets (3pcs) and urinals (4 pcs) and disposing of them in the Investor's storage facility. The price shall include all required stops of the existing water and sewer installation. Calculated in lump	*pcs.*	11.00		
9.2	Dismounting of existing squat toilets with any required chiselling. Calculated per piece	*pcs.*	8.00		
9.3	Procurement and mounting of squat toilets with toilet tanks and paper holders. Squat toilets shall be made of 1st class sanitary ware, certified and with a quality guarantee attached. The toilet tank shall be Geberit or similar, made of plastic, with a silent flushing system and appropriate EK valve. Calculated per piece	*pcs.*	8.00		
9.4	Procurement and mounting of toilet bowl with toilet tank, paper holder and cleaning brush. The bowl shall be made of 1st class sanitary ware, certified and with a quality guarantee attached. The toilet tank shall be Geberit or similar, made of plastic, with a silent flushing system and appropriate EK valve. Calculated per piece.	*pcs.*	3.00		
9.5	Procurement and mounting of washbasin with stand and single lever tap. The washbasin shall be made of 1st class sanitary ware, certified and with a quality guarantee attached. The price shall include mounting of a siphon made of flexible PVC hose, connection to the water grid made of flexible hoses with attached EK valves and the procurement and mounting of a towel and soap rack. Calculated per piece	*pcs.*	6.00		
9.6	Demolition of the sewer vertical lines brickwork with rubble transportation to a landfill up to 10 km away. Calculated per m1.	*m 1*	17.20		
9.7	Dismounting of the existing vertical sewer line grid made of PVC pipes with all required walls and floors demolition work and transportation to a landfill up to 10 km away. Calculated per m1.	*m 1*	17.20		
9.8	Dismounting and installation of a central cold water supply made of galvanized pipes with all structure demolition work and grid stopping costs included. Calculated per sanitary block. Average length of installation per sanitary block shall be 15m.	*pcs.*	11.00		
9.9	Dismounting of the existing floor sewer line distribution scheme with floow drains, including all required chiselling. Calculated per sanitary block. Average length of installation per sanitary block shall be 8m.	*pcs.*	11.00		
9.10	Manufacture of the water line installation with connecting the washbasin and toilet tank to the central cold water supply system. The installation shall be made with Ø 1/2" PVC pipes visibly along the wall. An EK valve shall be fitted at each sanitary block's connection to the central line. The price shall include all work, procurement of materials, all required chiselling and patchwork, complete for each sanitary block. Average length of installation per sanitary block shall be 15m. Calculated per sanitary block.	*pcs.*	11.00		

No	Work Description	UoM	Quantity	UoM Price	Amount
9.11	Manufacture of sewer lines and connecting sanitary consumers to the main existing vertical line: - washbasin, urinal with Ø 50 PVC pipe - toilet bowl, squat toilet with Ø 100 PVC pipe - floor drain with Ø 70 PVC pipe The price shall include all work, procurement of materials, all required chiselling and patchwork, complete for each sanitary block. Average length of installation per sanitary block shall be 8m. Calculated per sanitary block.	*pcs.*	11.00		
9.12	Manufacture of ventilation ducts and connections from every sanitary block. The price shall include all work, procurement of materials, all required chiselling and patchwork, complete for each sanitary block.	*pcs.*	11.00		
9.13	Procurement and mounting of new Ø 70 floor drains. Calculated per piece.	*pcs.*	5.00		
9.14	Procurement and mounting of anti-moisture and heat insulation for pipes.	*m1*	17.20		
9.15	Procurement and mounting of the sanitary block inspection manhole cover. Calculated per piece	*pcs.*	1.00		
9.16	Procurement and mounting of urinal with the accompanying kit. The urinal shall be made of 1st class sanitary ware, certified and with a quality guarantee attached, complete with a flushing system and accompanying EK valve. Calculated per piece	*pcs.*	4.00		
9.17	Required water supply system testing. Calculated in lump.	*pcs.*	1.00		
9.18	Manufacture of water and sewer vertical line protective masks made of 'Rigips' or 'Knauf' gypsum board panels mounted on a metal substructure. Boards shall be 12.5mm thick. All bandaged and puttied with calculated thermal insulation made of 10cm thick soft pressed mineral wool and finished as a wall, complete with patchwork after demolishing the protective vertical line. Calculated per m2.	m^2	20.00		
9.19	Manufacture of a damage control inspection manhole with a galvanized door on the vertical sewer lines. Calculated per piece.	*pcs.*	4.00		
9.20	Procurement and mounting of a 200/200 fitting for valve access, complete with door, mounted in bathroom walls. Calculated per piece.	*pcs.*	4.00		
9.21	Chiselling off existing floor ceramic tiles together with chiseling off the sloping coat and existing waterproofing, complete with cleaning the subfloor and rubble transportation to a landfill up to 10km away.	m^2	57.08		
9.22	Chiselling off existing wall ceramic tiles together with the plaster, complete with cleaning the walls and joints and rubble transportation to a landfill up to 10km away.	m^2	135.00		
9.23	Concreting the 5-6cm sloping floor coat using concrete mortar with a waterproofing additive such as Sika Estriplast or similar, with a slope towards the drain. Calculated per m2.	m^2	57.08		

No	Work Description	UoM	Quantity	UoM Price	Amount
9.24	Manufacture of sanitary block horizontal waterproofing using material similar to Sika Top Seal 107 two-component polymer-modified cement mass containing polymers and an especially designed cement aggregate mix with included additive, over the concreted sloping coat and 20cm up the walls. Calculated per m2.	m^2	62.80		
9.25	Procurement of materials and plastering sanitary block walls using lime plaster with an additive for 'old/new' bond. Calculated per m2.	*m2*	135.00		
9.26	Procurement of materials and putting up small locally manufactured 1st class wall ceramic tiles in adhesive such as Sika-bond T-8 or similar, complete with grouting using waterproof grouting compound. The sanitary block walls shall be tiled from top to bottom. Calculated per m2.	*m2*	135.00		
9.27	Procurement of materials and putting up small locally manufactured 1st class floor ceramic tiles over the sloping coat and waterproofing; tiles shall be set in adhesive such as Sika-bond T-8 or similar, complete with grouting using waterproof grouting compound. The sanitary block walls shall be tiled from top to bottom. Calculated per m2.	*m2*	57.08		
9.28	Procurement of materials and painting the ceiling with two coats of white emulsion paint with prior partial repairs. Calculated per m2.	*m2*	57.08		
	Total - Sanitation Blocks				

10 Miscellaneous Work

10.1	Procurement and mounting of interior wall cladding made of veneered chipboard mounted on an adequate substructure, complete with accompanying wooden profiled finishing strips. Calculated per m2	*m2*	55.00		
10.2	Procurement of materials and manufacture of a suspended ceiling type 'Armstrong' mounted on a metal substructure in hallways where electrical and mechanical installation lines shall be laid. Calculated per m2.	*m2*	123.20		
10.3	Procurement of materials and placement of floor ceramic tiles in store rooms; the tiles shall be 1st class and made by a local manufacturer, set in waterproof adhesive similar to Sika-bond T-8, grouted with waterproof grouting compound. Calculated per m2.	*m2*	31.00		
10.4	Procurement of materials, manufacture and painting of the indoor metal staircase fence h+1.10m. Calculated per m1 of mounted and painted fence. The price shall include painting of the wooden handrail with prior preparation and sanding.	*m1*	13.50		
10.5	Cleaning and transportation of the remaining rubble to a landfill up to 10km away.	*lump*	1.00		
	Total - Miscellaneous Work				**0.00**

SUMMARY

No	Work Description	UoM	Quantity	UoM Price	Amount
0	Dismantling and Demolition Work and Preparatory Work				
1	Doors and Windows				
2	Brickwork and Concrete Work				
3	Façade Work				
4	Carpentry Work				
5	Roofing Work				
6	Sheet Metal Work				
7	Weatherproofing				
8	Paint Work				
9	Sanitation Blocks				
10	Miscellaneous Work				

Total w/o VAT

PRICED BILL OF QUANTITIES

FOR THE PERFORMANCE OF FOUNDATION REHABILITATION WORK
WITH THE AIM OF FLOOD DAMAGE REMOVAL
THROUGH REHABILITATION and ADAPTATION PROJECT
OF THE GRAMMAR SCHOOL BUILDING

INVESTOR: "Svilajnac" High School in Svilajnac

BUILDING: Grammar School

No	Work Description	UoM	Quantity	UoM Price	Amount
1	**Previous Work**				
1.1	**Demolition of the concrete pavement.** Demolition of the pavement shall be done together with sublayer stripping. Solid material shall be separated and transported to a landfill designated by the Investor up to 15km away. The rubble shall be collected, taken out, loaded onto a lorry and transported to the town landfill. Calculated per m2.	m^2	39.00		
1.2	**Manual excavation of an 80cm wide ditch to the edge of the existing foundations (approx. 1.0m deep) next to the existing wall.** The excavation shall be done according to the design and provided elevation points. The sides of the ditch shall be clean cut and the bottom leveled. The excavation price shall include strutting and ditch security. Excavated soil shall be cast away from the ditch. After completing the work, the soil shall be poured back in and compacted in layers. Excess soil shall be loaded onto a lorry and transported to the town landfill. Calculated per m3 of soil in autochthonous state.	m^3	31.40		
1.3	**Manual excavation of soil in approx. 1.0m long lamellae underneath the existing foundation for the manufacture of new recessed foundations.** The excavation shall be done according to the dimensions and the distribution provided in the design (lamellae marked 1 through 7). Excavations for an individual lamella may not start earlier than 48 hours after concreting the neighbouring one. The soil shall be cast aside and transported to the construction landfill. After excavations the bottom shall be cleaned with spatulas and brooms and washed with water. The price shall include strutting and planking if necessary. Calculated per m3 of soil in autochthonous state.	m^3	21.54		
	Total - Previous Work				**0.00**

2 Concrete and Reinforced Concrete Work

2.1	**Concreting under existing foundations in approx. 1.0m long lamellae using MB30 concrete.** The distribution and dimensions of the lamellae are provided in the design. The work shall begin with concreting after excavations for the lamella marked 1. A 5cm concrete spot footing shall be made prior to concreting to provide an anchor for the reinforcement bars. Formwork shall be placed and the concrete poured to the height of 4-5cm above the bottom of the existing foundation from the side. The concrete shall be installed properly (vibrated) so as to provide concrete penetration under the entire surface of the foundation and along the entire width of the lamella. After that the other lamellae shall be made according to their predefined distribution. The price shall include all work and material, complete with formwork, concreting and excavations under the foundation. Calculated per m3 of new foundations.	m^3	12.92		
2.2	**Concreting the pavement using MB25 concrete** in a 10cm thick layer over a gravel buffer with simultaneous manufacture of expansion joints at every 2.00m and at the connection with old pavement. Calculated per m2	m^2	39.00		
2.3	**Procurement, transportation, cutting, shaping and installation of ribbed reinforcement bars RA 400/500.** The reinforcement bars shall be cleaned, cut, bent and mounted according to the design and structural detail. Calculated per kg.	*kg*	525.55		
	Total - Concrete and Reinforced Concrete Work				**0.00**

SUMMARY

1	Previous Work	0.00
2	Concrete and Reinforced Concrete Work	0.00

Total w/o VAT	**0.00**

PRICED BILL OF QUANTITIES

FOR THE PERFORMANCE OF ELECTRICAL INSTALLATION
WITHIN FLOOD DAMAGE REMOVAL WORK
THROUGH REHABILITATION and ADAPTATION PROJECT
OF THE GRAMMAR SCHOOL BUILDING

INVESTOR: "Svilajnac" High School in Svilajnac

BUILDING: Grammar School

No	Work Description	UoM	Quantity	UoM Price	Amount
1	**Preparatory Work**				
1.1	Survey of the electrical installation, checking the insulation of power cables from the junction box, testing the galvanic connection of the protective conductor between the grounding and metering&distribution cabinet and measuring the grounding resistance.	*h*	10.00		
	Total - Preparatory Work				**0.00**
2	**High Voltage Installation – electricity cabinets and power cables**				
2.1	Delivery and mounting of CJB junction box made of insulation material with a group of three NV 250/80A fuses. The box shall be mounted on the building facade. The item shall include delivery and installation of a min 80mm diameter flexible hose in the length of 3m with all accompanying construction work for the laying of a power line.	*pcs.*	1.00		

2.2	Delivery and mounting of a sufficiently large metering&distribution cabinet made of insulation material, equipped with the following equipment: - power reducers 75/5A/A.....3pcs - Ĝajdaôterminal box .....1pcs - semi-indirect measuring group 5A .....1pcs - compact switch 100A with low voltage trigger .....1pcs -NV three-way distribution block of xx/63A .....3pcs - drum switch GS 16A,250V.....1pcs - aut. fuse 25A,3p, type C,6kA.....6pcs - aut. fuse 10A,1p, type C,6kA.....5pcs - other mounting and connection material. The cabinet shall be made of insulation material, fitted with a single-pole wiring scheme and a three-point locking system. The item shall include the disassembly of the existing metering & distribution cabinet in the building ground floor and preparation of the wall opening for mounting the new one; development of a record with representatives of the Electricity Distribution Co regarding the newly formed billing group.	*compl.*	1.00		
2.3	Delivery and mounting of a sufficiently large distribution cabinet DC-S made of insulation material, equipped with the following equipment: - compact switch 63A with low voltage trigger .....1pcs - aut. fuse 25A,3p, type C,6kA.....6pcs - drum switch GS 16A,250V.....1pcs - ZUDS16/0,03A/A,4p.....1pcs - aut. fuse 16A, 1p, type C,6kA.....3pcs - aut. fuse 10A,1p, type C,6kA.....5pcs - other mounting and connection material. The cabinet shall be made of insulation material, fitted with a single-pole wiring scheme and a three-point locking system. The item shall include the disassembly of the existing distribution cabinet on the building 1st floor and preparation of the wall opening for mounting the new one.	*pcs.*	1.00		

2.4	Delivery and laying of N2XH-J 5x16mm2 power cable from the CJB to the MDC with all required connection and mounting materials.	m^1	16.00		
2.5	Delivery and laying of N2XH-J 5x16mm^2 power cable from the MDC to the DC-S with all required connection and mounting materials.	m^1	10.00		
2.6	Delivery and mounting of Fe/Zn strip from the metering connection point of the grounding rod to the main potential equalisation collector MPEC that shall be made near the ground floor MDC.	m^1	20.00		
2.7	Delivery and mounting of potential equalisation box PEB in the buildingâs sanitation facilities. The item shall include delivery and mounting of conductor P-Y 1x6mm2 from the MPEC to the PEB in the length of 12m.	*pcs.*	4.00		
2.8	Delivery and mounting of 200cm wide PNK cable tray with all mounting and connection material. The mount work shall be performed at approx. 3m height.	m^1	30.00		
2.9	Delivery and mounting of 100mm wide PNK cable tray with all mounting and connection material. The mount work shall be performed at approx. 3m height.	m^1	50.00		
2.10	Testing the installation; checking the connections, visual survey, measuring the installationâs current grounding resistance and issuance of a measuring protocol.	*h*	20.00		
Total - High Voltage Installation – electricity cabinets and power cables					**0.00**

3 Sockets and Lighting

3.1	Delivery and mounting of cable N2XH-J 5x2.5mm2 from the MDC ï DC-C ï classroom, by laying under the plaster or on existing PNK trays ï ground floor.	m^1	85.00		
3.2	Delivery and mounting of cable N2XH-J 5x2.5mm2 from the MDC ï DC-C ï classroom, by laying under the plaster or on existing PNK trays ï 1st floor.	m^1	80.00		
3.3	Delivery and mounting of classroom distribution cabinet DC-C, powering the lighting and socket circuits and consisting of the following equipment: -ZUDS 25/0,03A/A,4p.....1pcs -aut. fuse 16A,1p,B tip,6kA.....3pcs -aut. fuse 10A,1p,B tip,6kA.....2pcs - aut. fuse 6A,1p,B tip,6kA.....1pcs - connector 16A,230V,AC.....1pcs - other connecting and mounting material.....lump The DC-C shall be mounted above the door to every classroom with equipment enabling the installation of sensor lighting devices.	*pcs.*	12.00		
3.4	Delivery and mounting of cable N2XH-J 3x2.5mm^2 from the DC-C to the sockets in classrooms by laying under the plaster or on existing PNK trays.	m^1	360.00		
3.5	Delivery and mounting of cable N2XH-J 3x1.5mm^2 from the DC-C to the wiring of the general and anti-panic lighting in classrooms by laying under the plaster or on existing PNK trays.	m^1	550.00		
3.6	Delivery and mounting of cable N2XH-J 3x2.5mm^2 from the MDC and DC-S to general purpose sockets by laying under the plaster or on existing PNK trays.	m^1	250.00		
3.7	Delivery and mounting of cable N2XH-J 3x1.5mm^2 from the MDC and DC-S to the wiring of the general and anti-panic lighting in commo rooms by laying under the plaster or on existing PNK trays.	m^1	400.00		
3.8	Delivery and mounting of lighting fixture Efix TCS260 2x28W/840 HFP D6 WH with MASTER TL5 light sources and ballasts. The item shall include delivery and mounting of hangers and other mounting and connection materials ï classroom lighting.	*pcs.*	70.00		

3.9	Delivery and mounting of lighting fixture Efix TPS260 1x80W/840 HFP A WH with MASTER TL5 light sources and ballasts. The item shall include delivery and mounting of hangers and other mounting and connection materials ï classroom blackboard lighting.	*pcs.*	22.00		
3.10	Delivery and mounting of movement detector sensor LRM8114/00 SENSR MOV DET-surface mount with accompanying communication cable ï automatic light operation control.	*pcs.*	11.00		
3.11	Delivery and mounting of installation switch 250V,16A with adequate mounting box, single pole.	*pcs.*	12.00		
3.12	Delivery and mounting of installation switch 250V,16A with adequate mounting box, serial.	*pcs.*	10.00		
3.13	Delivery and mounting of installation switch 250V,16A with adequate mounting box, multi-way.	*pcs.*	4.00		
3.14	Delivery and mounting of wall mount single phase socket with accompanying mounting box.	*pcs.*	92.00		
3.15	Delivery and mounting of ceiling mount sensor light with LED light source 1x5W, fitted with time and photo relays. Completely mounted with light sources ï sanitation facilities.	*pcs.*	22.00		
3.16	Delivery and mounting of fluorescent surface mount prismatic diffuser light 1x28W, similar to type x ï hallways and staircases.	*pcs.*	24.00		
3.17	Delivery and mounting of surface mount panic light 1x8W with 1h autonomy, with pictograms marking the evacuation route, similar to type RILUX »SchneiderElectric«, insulation class II.	*pcs.*	28.00		
3.18	Testing the installation, connecting, commissioning and any other adjustments.	*h*	20.00		
	Total - Sockets and Lighting				**0.00**

4 Grounding and Lighting Rod

4.1	20x3mm Fe/Zn strip placed along adequate supports as the intake system across the roof covering. The work shall be done at the height of not less than 8m.	m^1	90.00		
4.2	Delivery and mounting of adequate support for the applied roof covering.	*pcs.*	90.00		
4.3	Delivery and mounting of height fixing set 2+2m complete with mounting and other necessary kit. Item shall include delivery and mounting of collars, metal plates and all other connecting material with the water breach protection system on the roof covering. All equipment shall be certified.	*pcs.*	1.00		

4.4	Delivery and mounting of early streamer device type IONIFLASH with 60ms forward time (FRANCE-PARATONNERRES). The item shall include handover of the certificated of compliance or report on testing the efficiency of the rod clamp with early streamer device issued by an independent laboratory, manufacturerõs instructions on the manner of determining the efficiency of the rod clamp with early streamer device after mounting (applicable intervals and manner) and the manufacturerõs instructions on the limitations of mounting the rod clamp with early streamer device, warranty sheet and the maintenance and periodic check manual.	*pcs.*	1.00		
4.5	Delivery and mounting of rod early streamer device adapter set.	*pcs.*	1.00		
4.6	Delivery and placement of warning sign õDANGER! HIGH VOLTAGE!ô on the pole of the rod clamp with early streamer device.	*pcs.*	1.00		
4.7	Connection of the galvanized strip with the roof sheet metal cover.	*pcs.*	15.00		
4.8	Visual survey of the installation, measuring the current grounding resistance and issuance of a measuring results protocol.	*h*	10.00		
	Total - Grounding and Lighting Rod				**0.00**

5 Finishing Work

5.1	Testing the delivered electrical installation by a competent institution and the issue of a Professional findings document in two copies.	*h*	20.00		
5.2	Testing the electrical installation with a thermal imaging camera under power with the development of a technical report.	*h*	15.00		
5.3	Development of the as-built design in three copies with verification by a competent body.	*h*	30.00		
	Total - Finishing Work				**0.00**

SUMMARY

1	Preparatory Work	0.00
2	High Voltage Installation – electricity cabinets and power cables	0.00
3	Sockets and Lighting	0.00
4	Grounding and Lighting Rod	0.00

5	Finishing Work	0.00

Total w/o VAT	**0.00**

PRICED BILL OF QUANTITIES

FOR THE PERFORMANCE OF HEATING INSTALLATYION WORK
WITH THE AIM OF FLOOD DAMAGE REMOVAL
THROUGH REHABILITATION and ADAPTATION PROJECT
OF THE GRAMMAR SCHOOL BUILDING

INVESTOR: "Svilajnac" High School in Svilajnac

BUILDING: Grammar School

No	Work Description	UoM	Quantity	UoM Price	Amount
1	**Rehabilitation of Central Heating in the Grammar School Building**				
1.1	Emptying the entire heating system in all three buildings.	*lump*	1.00		
1.2	Procurement, delivery and installation of balance regulation valves for the Grammar School building, diameter DN65, type STROMAX-GM, manufactured by Hertz or a product from another manufacturer with similar characteristics.	*pcs.*	1.00		
1.3	Dismounting of cast radiators tzpe 22-600, manufactured bz JUGOTERM Merošina.	*pcs.*	7.00		
1.4	Washing cast radiators with warm pressured water and detergent.	*pcs.*	41.00		
1.5	Painting cast radiators with heat resistant paint in the colour designated bz the Investor.	*pcs.*	41.00		
1.6	Dismounting of radiator valves diameter 1/2" and 3/8".	*pcs.*	41.00		
1.7	Dismounting of cast radiator consoles and carriers (3pcs+2pcs=5pcs).	*pcs.*	205.00		
1.8	Procurement, delivery and installation of cast radiator consoles and carriers (3pcs+2pcs=5pcs).	*pcs.*	205.00		
1.9	Separating the canal pipe network from the ground floor pipe network by cutting.	*pcs.*	41.00		
1.10	Dismounting of substandard black pipes Ø1/2” to Ø6/4”, duly marked on sketches.	*m* ^{1}	376.00		

1.11	Procurement, delivery and installation of black seamed and hydrotested heating pipes with pressure capacity up to 6bar and of the following diameters:				
	∅21,3 x 2,5 mm (1/2")	m^1	166.00		
	∅26,9 x 2,6 mm (3/4")	m^1	54.00		
	∅33,7 x 2,6 mm (1")	m^1	48.00		
	∅42,4 x 2,8 mm (5/4")	m^1	66.00		
	∅48,3 x 2,8 mm (6/4")	m^1	18.00		
	∅60,3 x 2,8 mm (2")	m^1	12.00		
	∅76,1 x 2,9 mm (2"1/2)	m^1	12.00		
					0.00
1.12	Procurement, delivery and mounting of thermostat set, diamater 1/2” (radiator valve + thermal head) on the cast radiators, manufactured by HERZ or a product from another manufacturer with similar characteristics.	*pcs.*	41.00		
1.13	Procurement, delivery and mounting of radiator valves, diameter 1/2” on the cast radiators, manufactured by HERZ or a product from another manufacturer with similar characteristics.	*pcs.*	41.00		
1.14	Mounting cast radiators with connection corrections because of the length of the thermostat valves and radiator valves.	*pcs.*	41.00		
1.15	Dismounting of 1/4” bleed valves and 1/2” air vents after washing and painting.	*pcs.*	24.00		
1.16	Procurement, delivery and installation of turnkey bleed valves, diameter 1/4”.	*pcs.*	20.00		
1.17	Procurement, delivery and installation of automatic 1/2” air vents, straight with automatic shut-off cocks.	*pcs.*	11.00		
1.18	Dismounting of installation washing taps, diameter 1/2”.	*pcs.*	2.00		
1.19	Procurement, delivery and installation of installation washing taps, diameter 1/2”, complete with plug and chain.	*pcs.*	2.00		
1.20	Cleaning and painting the new and old pipe network with heat resistant radiator paint in two coats.	m^1	752.00		
1.21	Cleaning and red lead coating the new pipe network with two coats of heat resistant primer.	m^1	376.00		
1.22	Petty materials: bends, t-pieces, reductions, welding wire, oxygen, cutting templates, acetylene, wire sleeves, couplings, holders, pipe network carriers etc. 40% from Item 11.		0.40		
1.23	Unforeseen work emerging during work execution (lump sum).	*пауш.*	1.00		
	Total - Rehabilitation of Central Heating in the Grammar School Building				**0.00**

2 Construction Work

2.1	Small construction work around pipe leads (lump sum)	*lump*	1.00		
	Total - Construction Work				**0.00**

3 Preparatory and Finishing Work

3.1	Preparatory and finishing work, hot and cold testing, regulation, provision of operating instructions, development of a record etc (lump sum)	*lump*	1.00		
	Total - Preparatory and Finishing Work				**0.00**

SUMMARY

1	Rehabilitation of Central Heating in the Grammar School Building	0.00
2	Construction Work	0.00
3	Preparatory and Finishing Work	0.00

Total w/o VAT	**0.00**

S U M M A R Y

А	Construction and Finishing Work	
Б	Foundation Rehabilitation	0.00
В	Electrical Installation Work	0.00
Г	Mechanical Installation Work	0.00

	Total w/o VAT	**0.00**
20%	**VAT**	0.00
	Total w/ VAT	**0.00**