ANNEX 1 - List of items and technical specifications

Label	Technical Specs (List the specs here, ie 200 kN…)	Time needed for delivery (In consecutive days)	Warranty (In months)
I – Lifting bags technical specifications:			
a- Lifting bag 1:			
- Effective lifting force in the range of 200 to 210 kN			
- Inflation Height not less than 250 mm			
b- Lifting bag 2:			
- Effective lifting force in the range of 350 to 370 kN			
- Inflation Height not less than 350 mm			
c- Lifting bag 3:			
- Effective lifting force in the range of 600 to 620 kN			
- Inflation Height not less than 450 mm			
d- Lifting bag 4:			
- Effective lifting force in the range of 900 to 940 kN			
- Inflation Height not less than 560 mm			
All the above lifting bags should comply to the following (Please mark Y/N next to each line and add comments as needed):			
- Have inserts for optional lifting rings			
- Be Aramid-reinforced			
- Have inlets that are easy to hook to in adverse conditions			
- Have integrated dust caps.			
- Be non-slip			
- Lifting capacity marked on the item			
- Can be operated using air bottles			
II – Lifting bags accessories (**Please mark Y/N next to each line and add comments as needed**):			
- Air Bottle (300 bar or more)			
- Pressure reducer			
- Control unit (containing air pressure gauge, safety couplers, non-return valves)			
- Shut-off hose			
- Lifting rings set (2)			
- Connection pieces			
- Air adapters			
- Other accessories as required for the operation of the lifting bags.			
- All the accessories and the control unit should be able to operate under a minimum load of 1000 kN.			
III – Petrol Pump (Preferably dual pump) :			
The petrol pump will be used to power the lifting bags. Accordingly, it will have to meet the below technical requirements:			
- Minimum working pressure 700 bar or higher			
- First stage pressure 0-150 bar or better			
- First stage output 2900cc/min or better			
- Second stage pressure range 150 – 280 bar or better			
- Second stage output 1300min/cc or better			
- Third stage pressure range 280 – 720 bar or better			
- Third stage output 550 cc/min or better			
- Continuous operation of at least 3 continuous hours			
- Capacity of fuel tank preferably above 3000 cc			
- Sound level with load preferably below 85 dB (Preferably compliant with EN 13204)			
- Effective oil tank capacity preferably 5500 to 6000 cc			
- Petrol engine (Y/N)			
- Number of connections, minimum 2			
- Number of usable connections at the same time, minimum 2			
- Pump type, preferably 3 stage per above pressure and outputs (Axial preferably)			
- Engine type, minimum 5hp, 4 stroke, minimum 4kW output			
- Preferably with double hose reels (15 m minimum)			
- Total weight of engine + houses not to exceed 70 kg with full tanks			
- Compliant to EN 13204 and NFPA 1936 or higher			
IV – Petrol Engine Power Cutter:			
- Cutting depth of at least 120 mm			
- Petrol driven engine			
- Minimum displacement 66 cc			
- No load speed of minimum 2700 rpm			
- Power output of engine minimum 4hp			
- Weight not to exceed 9.5 kg			
V – Demolition Hammer:			
- Impact energy 17 Joules or more			
- Minimum watts out 750 W			

- Hammer rate 2,000 bpm minimum			
- Weight, not to exceed 10 kgs			
- Preferably with vibration control			
VI – Heavy-duty breaker:			
- Voltage 240V			
- Minimum impact energy 50 Joules			
- Minimum 14 amps power			
- Hammer rate on load 900 bpm			
- Vibration measurement not to exceed 5m/s^2			
VII - Supplier is capable and willing to give the Civil Defense teams a brief on the operational requirements and know how Y/N (Total Grade Weight 3)			
Total			