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**Specifications of Scanner, Bend & Re-Bend Test Machine for Steel Bars and Automatic
Feed Core Cutter for RCC for Civil Engg. Deptt., GZSCCET, Bathinda.**

Sr. No.	Name of Equipment	Specifications	Qty.
01.	Scanner: Detection System System: system based on Magnetic field principle for locating reinforcing bars and measuring the depth of concrete cover. The rebar diameter can also be found using the PC software or monitor, the system should be completely cord less and consists of scanner, monitor thorough Infra-red mode; The tool should be based on Indian standard of rebars based on BIS 1786:1985. It should have an operating temperature from -10° C to + 50° C. The tool should have quick scan mode for measuring cover and location, Image scan mode for analysis of diameter and image of rebars for area of 600x600 mm, Block scan and Map mode should be available for analysing large areas together up to 12x12m in software and monitor.	<p>1 scanner, 1 Soft Pouch, 1 Hand Strap, 1 Battery Pack, 1 Battery Charger, 1 Power supply cord, 1 10 or 1 11 Reference Grid Set (5), 1 Brush, 1 Adhesive Tape, 1 Marker Set, Monitor, 1 Adapter IR, Data Module, 1 Data Cable USB, 1 Headset, 1 PROFIS Ferro scan PC Software 1 Meter Stick (depending on the market number), 1 Cleaning Cloth, 2 Producer Certificates Operating Instructions of complete system, Complete packaged in a toolbox and a cardboard box.</p> <p>Operating Range: Depends on scan mode, rebar spacing and diameter. Position/diameter: to resolve single bare min. Spacing 36mm or spacing: coverage (s:c) = min. 2 : 1 whichever is greater. Depth: Min. Depth 10 mm for depth reading.</p> <p>Typical Accuracy: Depth: depends on scan mode, rebar spacing and diameter. Bar diameter: ± 1 spacing diameter (s:c ≥ 2:1). Bar location: bar centre ± 3mm / ± 1 in (s:c ≥ 1.5:1).</p> <p>Scanning Speed: Maximum 0.5 m/s ; 1.64 ft/s</p> <p>Detection Principle: Magnetic field</p> <p>Data Interface: Scanner – monitor: infra-red; monitor- PC:USB</p> <p>Battery Life: Typically 8 hours (battery pack)/ 2 hours (PSA 82 battery pack)</p> <p>Operating Temperature:- 10°C to 50°C / + 14° F to 122°F</p> <p>Relative Humidity: max. 90%, non-condensing</p> <p>Storage Temperature:- 20°C / -4°F to + 158°F</p> <p>Protection: IP 54</p>	01 No.
02.	Bend and Re-band Test Machine for Steel Bars:	Gear shift, working disc, stop gauge, Saddles, Pile head and pile head bushes should be made of high quality steel with proper heat treatment and 2mm thick external case to ensure high performance- Two limit switches to ensure the accuracy of	01 Set

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		<p>the bending angle-way of bending/Manual and Automatic</p> <p>Diameter range of bars & pipes (mm)- 6-50</p> <p>Bending angle-positive direction-0-180 (the angle can be set freely in the range)</p> <p>Bending angle-reverse direction-0-180 (the angle can be set freely in the range)</p> <p>Rotating speed (r/min)-8</p> <p>Motor HP-3HP, 1440RPM</p> <p>Dimension-800x710x750(mm)</p> <p>Weight-310 kg (approx)</p> <p>Power Supply – 3 Phase, 440 Volts</p>	
03.	Automatic feed Core Cutter for RCC:	<p>Technical Data</p> <p>Input Power – 3600W@230V</p> <p>Cooling – Water cooled</p> <p>Weight of complete system: 35-40KG</p> <p>Gearing – 10, electronic</p> <p>Drilling range (Rig based wet)-52-500mm</p> <p>Rotation Speed – 286-667 rpm</p> <p>Chuck type - BL</p> <p>IP55 (IEC529)</p> <p>Automatic Cut Assist Features: 1. Surface detection 2. Water ON-hole starting 3. Concrete Drilling 4. Iron boost: Provide the necessary additional power when rebar is detected 5. Concrete drilling 6. Water OFF-pull back.</p> <p>Drill Stand Features: 1. Built in fine feed control 2. At least two level indicators (bubble levels) for exact adjustment of stand 3. Built in angle adjustment and folding mechanism 4. Standard anchor base plate with 3 level screws.</p> <p>Complete accessories 1. one meter long drill stand 2. Clamping spindle 3. Clamping nut 4. Anchor M 16x65 (25no) 5. Setting tool to fix the anchor 6. Hammer drill bit diameter TECX 20mm. 7. 650W hammer drill machine</p> <p>Consumable: diamond core bits having sizes – 77mm, 102mm, 152mm, 202mm all 400mm long having Qty 1 pc each. Once the core bits worn out there should be possibility of replacing the segment on barrels.</p>	01 No.