

010520

# **OPERATING INSTRUCTIONS** POWERVIBE<sup>TM</sup> HIGH FREQUENCY VIBRATOR FPV-45 & FPV-60





To reduce the risk of injury, all operators and maintenance personnel must read and understand these instructions before operating, changing accessories, or performing maintenance on this power equipment. All possible situations cannot be covered in these instructions. However care must be exercised by everyone using, maintaining or working near this equipment.

1300 353 986 flextool.com.au



Parchem Construction Supplies Pty Ltd 7 Lucca Road, Wyong NSW AUS 2259

#### CONTENT

Introduction	2
Applications	2
Functions and controls	2
Hazards and risks	2
Operation	3
Care and preventive maintenance	3
Cleaning and storage	3

#### INTRODUCTION

## General Safety Instructions for the Operation of Power Equipment

The goal of Flextool is to produce power equipment that helps the operator work safely and efficiently. The most important safety device for this or any tool is the operator. Care and good judgement are the best protection against injury. All possible hazards cannot be covered in this manual, but we have tried to highlight some of the important items. Operators should look for and obey Caution, Warning and Danger labels placed on the equipment. Operators should read and follow safety instructions packed with each product to learn how each machine works. Even if you have previously used similar equipment carefully check out each machine before you use it, get the "feel" for it and know its capabilities, limitations, potential hazards, how it operates, and how it stops.

#### **APPLICATIONS**

**Civil:** roadways, kerbing, runways, pre-cast beams, bridge decks, piers and columns.

**Commercial building:** strip and raft foundations, stairs, walls, wall panels and columns, floors, suspended slabs, tilt panels and retaining walls.

**Residential building:** floor stumps, wall cavities, house slabs, wall footings, septic tanks, paving slabs. And driveways

#### **FUNCTION AND CONTROLS**

#### POWERVIBE

The Flextool PowerVibe operates from a standard 240 Volt / 10 Amp power outlet. Prior to connecting the unit to the power socket ensure a safe environment for operation free from sharp objects and water that could cause damage to the power cord. Inspect the entire unit including control box, RCD protection unit and power cord to ensure all are in good and safe operating condition.

- 1. Prior to connecting to the power socket ensure the PowerVibe control switch is in the OFF "O" position.
- 2. Connect the PowerVibe to the power socket
- 3. Push the reset button on the RCD protection unit to active the device
- 4. Push the control switch to the ON "I" position to start the PowerVibe
- 5. Vibration will start after 2 seconds at low speed Vibration will then slowly increase to maximum operating speed.
- 6. To turn off push the control switch to the OFF "O" position
- 7. Disconnect the plug from the power socket.

#### HAZARDS AND RISKS

- NEVER allow any person to operate equipment without adequate instruction.
- ENSURE all operators read, understand and follow the operating instructions.
- SERIOUS INJURY may result from improper or careless use of this machine

#### MECHANICAL HAZARDS

- DO NOT operate the machine unless all protective guards & covers are in place.
- ENSURE that the electricity supply to the unit is disconnected / isolated before removing guards and covers or making adjustments.
- KEEP hands and feet clear of rotating and moving parts as they will cause injury if contacted.
- DO NOT leave the equipment in operation while it is unattended.
- EXERCISE CARE when handling concrete vibrators. Exposure to vibration or repetitive work actions may be harmful to hands and arms.
- DO NOT hold the vibrator head in your hands while it is running. Hold the vibrator by the flexible shaft to isolate your hands from the vibration.
- NEVER stand on the vibrating head while it is operating.
- ENSURE that repairs to machinery are carried out by QUALIFIED & LICENCED personnel.

#### **ELECTRICAL HAZARDS**

- RISK OF FATAL OR SERIOUS INJURY FROM ELECTRICAL SHOCK may arise through incorrect use, operating the equipment where leads and other electrical components are damaged or through ingress of moisture and water.
- ELECTRICAL HAZARDS may be high due to the careless use of equipment and extension leads.
- INSPECT electrical leads, plugs and sockets regularly for damage, if any damage is found isolate equipment and seek immediate repair.
- DO NOT operate the equipment using coiled or tangled extension leads.

- DO NOT operate the equipment where moisture or water is present.
- ENSURE that repairs to the electric motor and wiring are carried out immediately by QUALIFIED & LICENCED personnel.
- DO NOT clean or hose the machine while the electrical supply is connected.

#### **NOISE HAZARDS**

- EXCESSIVE NOISE can lead to temporary or permanent loss of hearing.
- WEAR an approved hearing protection device to limit noise exposure as required by Occupational Health and Safety regulations. Noise levels in excess of 85dB(A) may be produced by engines and concrete vibrators.

#### **PROTECTIVE CLOTHING**

- ALWAYS wear protective clothing and footwear to prevent the skin coming into contact with wet concrete.
- PROTECTIVE FOOTWEAR should be worn to reduce injuries from penetration through the sole, contact with cutting objects, slipping and contact with wet concrete.
- EYE PROTECTION must also be worn to prevent eye injuries.
- USE GLOVES when handling and operating concrete vibrators.

#### ADDITIONAL HAZARDS

- Slip/Trip/Fall is a major cause of serious injury or death.
- Beware of power leads, the flexible shaft and water left on the walking or work surface.
- Exercise caution and ensure that the perimeter of elevated formwork or platforms is protected.
- Exercise care when working in the vicinity of unprotected holes or excavations

#### **OPERATION**

- If an extension lead is required, its maximum length must not exceed 10m. Select a Heavy-Duty lead to minimise voltage drop and prevent damage to the equipment. Never operate with the extension lead in a coiled position.
- DO NOT use an eccentric-type immersion vibrator head as an external vibrator by applying it to the outside of formwork.
- DO NOT operate the vibrating head out of concrete for extended periods.
- DO NOT leave it running while you wait for fresh supplies of concrete to be placed. Vibrator heads are designed to be cooled by the concrete in which they are immersed.
- DO NOT drag the concrete vibrator through the concrete or use it shift or move the concrete. Using a concrete vibrator in this way will cause damage to the vibrating head and flexshaft.

- 1. Place the concrete vibrator head into the concrete so that the vibrating head is at ninety degrees to the surface, the vibrating head should not be inserted at an angle.
- 2. Hold the vibrator in the concrete for approx 10-15 seconds until no further air bubbles appear on the surface.
- Lift the vibrator from the concrete slowly to ensure the hole left by the vibrating head is correctly back filled with concrete.
- 4. Again, place the vibrating head into the concrete at a distance of approx 40-60cm from where it was previously placed.
- 5. Repeat steps 1-4 across the entire surface of the concrete to ensure correct compaction of the concrete.

#### CARE AND PREVENTATIVE MAINTENANCE

- Keep the equipment clean and free of concrete residue and build up.
- Concrete vibrators must be handled with care and be properly maintained in order to avoid unnecessary breakdowns. Check regularly for signs of wear and rectify any faults immediately.
- The exterior of the flexshaft and the vibrator head are subject to abrasion and wear. If the vibrator is operated unchecked, concrete will eventually enter the vibrator head or the flexshaft. Naturally, the cost of repairing a vibrator which has been allowed to deteriorate in this way will be greater.
- Regular inspection of the vibrator and the flexible shaft will avoid these problems.

#### **CLEANING AND STORAGE**

- It is advisable to wash the vibrator head and flexshaft with clean water after each use and before storing. This will ensure that concrete does not accumulate on the exterior of the unit that can cause overheating and premature failure of the unit
- DO NOT use water or pressure cleaner on the control box, power lead and RCD protection device, only the vibrating head and flexible shaft should be cleaned with water.

## FLEXTOOL<sup>®</sup> POWERVIBE<sup>™</sup> HIGH FREQUENCY CONCRETE VIBE 45MM (FPV-45)

Model	Operating Weight (kg)	Vibrator Head Diameter (mm)	Vibrator Head Length (mm)	Flexshaft Length (m)	Amplitude (mm)	Centrifugal Force (kN)	Vibration (vpm)	Voltage (v)	Current (A)	Power Cable Length (m)	Shipping Dimensions (L x W x H) (mm)	Shipping Weight (kg)	Product Code	
FPV-45	17.7	45	368	6	2	2.6	12000	240	6	10	890 x 730 x 120	19.7	FT201831- UNIT	

### FLEXTOOL<sup>®</sup> POWERVIBE<sup>™</sup> HIGH FREQUENCY CONCRETE VIBE 60MM (FPV-60)

Model	Operating Weight (kg)	Vibrator Head Diameter (mm)	Vibrator Head Length (mm)	Flexshaft Length (m)	Amplitude (mm)	Centrifugal Force (kN)	Vibration (vpm)	Voltage (v)	Current (A)	Power Cable Length (m)	Shipping Dimensions (L x W x H) (mm)	Shipping Weight (kg)	Product Code	
FPV-60	20.5	60	436	6	2.2	4.5	12000	240	6	10	890 x 730 x 120	22.5	FT201832- UNIT	