

















IF IT'S WORTH BUILDING, IT'S WORTH TESTING

Contents



This wishlist was generated on 27/07/2017, and contains the following Products:

42-4300

150mm Aggregate Crushing Value Apparatus. Supplied Complete with Metal Measure and Tamping Rod.

42-5310/01

Los Angeles Abrasion Machine with CE Safety Cabinet W/ Microswitches. 220-240V 50Hz 1Ph.

42-5300/10

Set of 12 Abrasive Charges (ASTM).

82-5270

Non Hazardous Glass Thermometers -1 - +51°C

82-5245

Portable Thermometer 0 - +250°C

82-7091

Silica Gel

47-0011

Calibrated Spring Balance

47-0012

Tray and Chains

78-5447/01

Electronic Balance - 3600g x 0.01g

81-0200

Aluminium Scoop Small

81-0310

Trowel - Gardeners type

29-5000

Density Spoon.

81-0508

Heat-Resistent Gloves, With Gauntlet

82-7720/01

www.ele.com # +44 (0)1525 249 200 # +1 (800) 323 1242 Page 2 of 58

Contents



Vacuum Pump

81-0375

Rubber Tubing

82-2660

Funnel

45-3810/01

Rotatest 1500

45-3803

Filter Discs Pack of 100

46-6100/01

Asphalt Binder Analyser 220-240V 50/60 Hz

82-1020

Volumetric Flask - 250 ml

82-1040

Volumetric Flask - 500 ml

82-1060

Volumetric Flask - 1000 ml

45-3855/01

Reflux Extractor (4000 gram)

45-3857

Filter Paper

45-6750/01

Gyratory Compactor to EN 12697-31, 10, ASTM D6925, SHRP M-002, AASHTO T312, inc. PC 220-240V 50Hz

45-6750/10

100mm Dia mould & platens

45-6750/25

Spacer 100mm to compact 63mm height on 45-6750

45-6710

Specimen Extruder

www.ele.com # +44 (0)1525 249 200 # +1 (800) 323 1242 Page 3 of 58

Contents



45-6750/28

Small air compressor for 45-6750

45-6750/12

150mm Dia mould & platens

45-6750/26

Spacer 150mm to compact 63mm height on 45-6750

45-6750/22

150 mm filter papers (pack of 100)

47-0450

PRD Split Mould and Baseplate

47-0455/01

Vibrating Hammer

47-0480

300 mm Shank

82-7031

Paraffin Wax

81-4775

Polythene Bag - Pack of 50

24-9250

Filter Paper Equivalent to Whatman No 5 150mm Dia Box of 100.

82-7861

Filter Paper - Fast

82-7171

Sodium Sulphate

82-7401

Standard Sand - 600/300 µm



150mm Aggregate Crushing Value Apparatus. Supplied Complete with Metal Measure and Tamping Rod.

Code: 42-4300

Product Group: Aggregate Crushing Value (ACV) and Ten Percent Fines Value (TFV)

Comprising of 150 mm nominal diameter steel cylinder, plunger and base plate supplied complete with metal measure and tamping rod.

Standards BS 812-112

Further Information

NOT AVAILABLE FOR SALE IN THE USA

Accessories



Tamping Rod 16mm Dia X 600mm long hemispherical at both ends.

Code: 34-0130

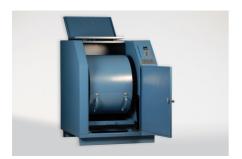
Alternatives



75mm Aggregate Crushing Value Apparatus. Supplied **Complete with Metal Measure and Tamping Rod.**

Code: 42-4500

www.ele.com **= +1 (800) 323 1242** Page 5 of 58



Los Angeles Abrasion Machine with CE Safety Cabinet W/ Microswitches. 220-240V 50Hz 1Ph.

Code: 42-5310/01

Product Group: Los Angeles Abrasion Machine

The machine consists of a closed hollow cylindrical steel drum rotating around its horizontal axis on ball bearing units mounted on a sturdy base framework. Also the full enclosure ensures noise is minimized.

The drum is driven at a speed of between 30 - 33 rpm via an enclosed belt drive arrangement from an electric motor/gearbox unit situated on the base frame. Inside the drum a full length steel shelf is attached, accessed by a dust-proof opening.

The cylinder incorporates a removable internal shelf, one shelf position is provided to meet the requirements of both the ASTM and EN test standards.

Controls are located easily on the right-hand side of the machine at convenient operator height.

Start and stop push buttons and a subtracting revolution counter allows the user to preset the number of revolutions before an automatic stop.

Standards

EN 1097-2, ASTM C131, ASTM C535, NF P18-573

Further Information

NOT AVAILABLE FOR SALE IN THE USA

Accessories

Set of 12 Abrasive Charges (ASTM).

Code: 42-5300/10



+44 (0)1525 249 200

= +1 (800) 323 1242

Set of 12 Abrasive Charges EN)

Code: 42-5305/10



Alternatives



Los Angeles Abrasion Machine Meets ASTM and European Standards. 220-240V 50Hz 1Ph.

Code: 42-5305/01



Set of 12 Abrasive Charges (ASTM).

Code: 42-5300/10

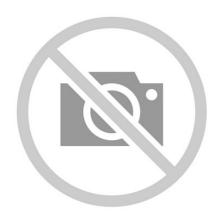
Product Group: Los Angeles Abrasion Machine, Los

Angeles Abrasion Machine

ASTM Set of 12.

Standards

EN 1097-2, ASTM C131, ASTM C535, AASHTO T96



Non Hazardous Glass Thermometers -1 -+51°C

Code: 82-5270

Product Group: Non Hazardous Glass Thermometers

0.1°C divisions + total immersion

Further Information



Portable Thermometer 0 - +250°C

Code: 82-5245

Product Group: Portable Dial-type Thermometers

25 mm diameter dial with a 100 mm long stem and protective sheath.

Further Information

NOT AVAILABLE FOR SALE IN THE USA

www.ele.com # +44 (0)1525 249 200 # +1 (800) 323 1242 Page 10 of 58



Silica Gel

Code: 82-7091

Product Group: Chemicals, Test and Reference

Materials

Coarse. No hazard. 500 g.

Further Information



Calibrated Spring Balance

Code: 47-0011

Product Group: Rate of Spread of Coated Chippings

Standards

EN 12272-1, BS 598-108

Further Information



Tray and Chains

Code: 47-0012

Product Group: Rate of Spread of Coated Chippings Comprising one 300 mm square tray and four chains.

Standards

EN 12272-1, BS 598-108

Further Information



Electronic Balance - 3600g x 0.01g

Code: 78-5447/01

Product Group: Electronic Balances

Further Information

Not available for sale in the USA

Specification

Capacity resolution 3600 g x 0.01 g Pan size 160 x 160 mm

Mains and battery No

260 x 170 x 90 mm Dimensions (I x w x h)

Weight

Weighing units g, kg, ct, GN, N, lb, oz, lb:oz,

ozt, dwt, T, custom unit

Readability 0.1 g



Aluminium Scoop Small

Code: 81-0200

Product Group: Scoops and Shovels

82 x 127 x 50 mm, cast aluminium with handle

Further Information



Trowel - Gardeners type

Code: 81-0310

Product Group: Trowels and Floats

Further Information



Density Spoon.

Code: 29-5000

Product Group: Field density tools For removing soil from the hole



Heat-Resistent Gloves, With Gauntlet

Code: 81-0508

Product Group: Miscellaneous Laboratory Hardware

Further Information



Vacuum Pump

Code: 82-7720/01

Product Group: Vacuum Pumps

Further Information

NOT AVAILABLE FOR SALE IN THE USA

Specification

Type Single stage Pump Oil filled rotary

Ultimate vacuum

Displacement

Better than 0.1 mbar

42 litres per minute (2.4

m³/hour)

Electrical supply 220 – 240 V AC, 50 - 60 Hz, 1

ph

Weight 12.7 kg

www.ele.com +44 (0)1525 249 200

= +1 (800) 323 1242



Rubber Tubing

Code: 81-0375

Product Group: Vacuum Pumps, Rubber Tubing

Further Information

NOT AVAILABLE FOR SALE IN THE USA

Specification

Bore 6.5 mm
Wall thickness 5.0 mm
Sold by Metre

www.ele.com +44 (0)1525 249 200

= +1 (800) 323 1242



Funnel

Code: 82-2660

Product Group: Funnels and Flasks

Polythene, 200 mm diameter.

Further Information

Page 22 of 58



Rotatest 1500

Code: 45-3810/01

Product Group: Asphalt Centrifuge Extractors

Centrifuge extractor used to determine the quantitative amount of bitumen in bituminous paving mixtures. Variable speed control from 0 to 3600 rpm through the front panel mounted control knob and brake control included for rapid deceleration.

Precision machined aluminium removable cover with integral cup for adding solvent, with sealed cast aluminium housing. Centrifuge extractor used to determine the quantitative amount of bitumen in bituminous paving mixtures. Variable speed control from 0 to 3600 rpm through the front panel mounted control knob and brake control included for rapid deceleration.

Precision machined aluminium removable cover with integral cup for adding solvent, with sealed cast aluminium housing.

Standards

EN 12697-1, ASTM D2172, AASHTO T164

Further Information

NOT AVAILABLE FOR SALE IN THE USA

1500 g capacity. Supplied with 100 Filter Discs. For 220 V AC, 50 - 60 Hz, 1ph.

Accessories



Bowl - 2.5 litre

Code: 81-5020

www.ele.com # +44 (0)1525 249 200 # +1 (800) 323 1242



Desiccator - Non-vacuum

Code: 82-2100



Evaporating Dish - 100 x 40 mm

Code: 82-1970



Filter Discs Pack of 100

Code: 45-3803



Hotplate

Code: 78-2950/01



Measuring Cylinder - Glass 100 ml

Code: 82-0380

www.ele.com +44 (0)1525 249 200

= +1 (800) 323 1242



Measuring Cylinder - Glass 1000 ml

Code: 82-0500



Sample Tray - 306 x 306 x 38 mm

Code: 81-4020



Silica Gel

Code: 82-7091



Volumetric Flask - 100 ml

Code: 82-1000



Volumetric Flask - 1000 ml

Code: 82-1060

Alternatives

www.ele.com # +44 (0)1525 249 200 # +1 (800) 323 1242 Page 24 of 58





Muffle Furnace

Code: 83-4170/01



Rotatest 3000

Code: 45-3815/01



Filter Discs Pack of 100

Code: 45-3803

Product Group: Asphalt Centrifuge Extractors

248mm outer diameter with 44mm diameter hole.

Standards

EN 12697-1, ASTM D2172, AASHTO T164

Further Information



Asphalt Binder Analyser 220-240V 50/60 Hz

Code: 46-6100/01

Product Group: Ignition Method

Designed to measure the asphalt binder content of hot mix asphalt (HMA) using loss on ignition, in accordance with AASHTO T 308-10, ASTM D6307-10 and BSEN 12697-39:2012.

Further Information

The integral microprocessor controlled weighing and calculation system is configurable to allow variations to the standard test method. Test result reports are available in both printed and software format. The high temperature afterburner minimises the production of noxious waste fumes. Supplied complete with 2 sets of sample baskets.

Features:

- Designed to measure asphalt binder content by loss on ignition
- Avoids health, environmental and waste management issues
- Avoids the expense associated with older solvent extraction methods
- · Reduced emissions due to high temperature afterburner
- Controlled via a multi-lingual touchscreen interface
- English, Spanish, French, Chinese, Italian and Russian language display
- · Other languages are available to order
- Automatic calculation of final sample weight and binder % result
- Adjustable aggregate correction factor
- Average test times from 20 mins for 6 mm aggregates, to 45 mins for 40 mm aggregates
- Permanent (dot-matrix) printed reports
- USB data output compatible with most spread sheets
- Easy naming, storage and recall of recipes that can be transferred between units
- Simplified menu structure with secure 'Supervisor' and 'Operator' settings
- · Metal waste gas extraction pipe
- Factory fitted thermocouple access port, if temperature calibration is to be carried out
- Precise weight measurements, displayed to 0.1g resolution
- Capacity for large sample sizes for more accurate results (max. sample is 4.5kg)

Specification

Max Temp (°C) 750

Dimensions: Internal (HxWxD) 220 x 450 x 350 mm Dimensions: External (HxWxD) 980 x 600 x 775 mm

www.ele.com +44 (0)1525 249 200

= +1 (800) 323 1242

www.ele.com +44 (0) 01525 249 200

Type Thermocouple type Max power (W) Bench-top K 8000



Volumetric Flask - 250 ml

Code: 82-1020

Product Group: Funnels and Flasks

Soda glass, stoppered to BS ISO 1042 Class B.

Further Information



Volumetric Flask - 500 ml

Code: 82-1040

Product Group: Funnels and Flasks

Soda glass, stoppered to BS ISO 1042 Class B.

Further Information



Volumetric Flask - 1000 ml

Code: 82-1060

Product Group: Funnels and Flasks

= +1 (800) 323 1242

Soda glass, stoppered to BS ISO 1042 Class B.

Further Information



Reflux Extractor (4000 gram)

Code: 45-3855/01

Product Group: Reflux Extraction

- 4000 gram capacity
- Glass jar for visual observations
- Thermostatically controlled hot plate

The 4000 gram capacity of the Reflux Extractor provides higher accuracy for acceptance testing procedures. This extractor has two cone type screens holding 2000 grams each. The unit consists of two cone screens, water condenser, pyrex reflux jar, a thermostatically controlled hot plate and a supply of filter paper.

Standards

ASTM D2172, AASHTO T164

Further Information

NOT AVAILABLE FOR SALE IN THE USA

For 220 - 240 V AC, 50 - 60 Hz, 1ph.

Accessories



Filter Paper

Code: 45-3857



Filter Paper

Code: 45-3857

Product Group: Reflux Extraction

Filter papers for 4000 gram capacity reflux extractor. Coarse-textured at grade 617 and 40 cm diameter.

Standards

ASTM D2172, AASHTO T164

Further Information

Pack of 50.



Gyratory Compactor to EN 12697-31, 10, ASTM D6925, SHRP M-002, AASHTO T312, inc. PC 220-240V 50Hz

Code: 45-6750/01

Product Group: Gyratory Compaction

One of the best methods of laboratory compaction is considered to be Gyratory for not only the material's assessment of compactibility, but also the production of test samples. The method achieves this by the application of a vertical stress, typically 600 kPa via platens to a mass of asphaltic mixture inside a 100 or 150mm diameter mould. Whilst platens are kept parallel and horizontal, the longitudinal axis of the mould is gyrated at a fixed angle to the vertical axis.

During the test process, the height of the specimen is measured automatically and the mixture density and void content are calculated.

Compaction data is displayed in real time (graphical and tabular) and is available for download to MS Excel(tm) The operator has the ability to choose whether to compact for a certain number of gyrations or until a target mixture density or void content is achieved.

Further Information

Features:

- Full compliance to EN 12697 part 10 and 31
- Configurable to comply with SHRP Superpave
- Both 150mm and 100mm moulds can be tested without any modification
- · Automatic mould insertion and retraction
- Cold mix (emulsion) materials can be compacted, with fluid collection facility
- Data acquisition and control via host desktop PC
- Export compaction data to MS Excel(tm)
- · UKAS traceable factory calibration
- Can accept moulds up to 300mm in height

Product Specification:

- High stability steel frame with low flex and distortion
- A 95mm pneumatic cylinder
- Safety gates with interlock
- Specimen table
- Accurate stress control via high precision regulator
- High quality inverter for accurate speed control
- Specimen height measurement via linear potentiometer
- · Highly durable wheels for ease of movement
- 16bit control and data acquisition
- PC included

Software:

- User-friendly, intuitive and reliable Windows(tm) software
- 2 methods of compaction no. of gyrations and target density
- User guided step-by-step through compaction
- Real-time display of current height, density and void content
- Software communicates with the gyratory compactor via USB interface
- Utilities are included for transducer check, diagnostic routines and calibration

Specification

Stress 600 kPa nominal, 1000 kPa

Max

Mixture types Wet and Dry Machine speed 30 rpm Angle of gyration 0.2 to >2°

Electrical supply 220-240 V 50Hz (16 amp) Sample sizes 100 and 150 mm dia Compressed air supply 7-10 bar, 350 L p/m Dimensions (WxHxL) 790 x 995 x 1920

Accessories



100mm Dia mould & platens

Code: 45-6750/10



100mm Dia mould & platens inc. specimen temperature measurement

Code: 45-6750/23



100mm Dia mould & platens, slotted for emulsion mix

Code: 45-6750/20

+44 (0)1525 249 200

= +1 (800) 323 1242



100mm Dia split mould

Code: 45-6750/27



100mm filter papers (pack of 100)

Code: 45-6750/24



150 mm filter papers (pack of 100)

Code: 45-6750/22



150mm Dia mould & platens inc. specimen temperature measurement

Code: 45-6750/21



150mm Dia mould & platens

Code: 45-6750/12



150mm Dia mould & platens, slotted for emulsion mix

Code: 45-6750/15

www.ele.com +44 (0)1525 249 200

= +1 (800) 323 1242



2 deg. angle plate

Code: 45-6750/17



Calibration kit for internal angle lead

Code: 45-6750/11



Display, Shear Force

Code: 45-6750/18



Internal angle measuring device

Code: 45-6750/13



Internal angle measuring device inc. asphalt Hot Mix Simulator (HMS – Hot Mix Simulator)

Code: 45-6750/14

www.ele.com +44 (0)1525 249 200



Option for 300mm mould height (cannot be retro-fitted)

Code: 45-6750/16



Small air compressor for 45-6750

Code: 45-6750/28



Spacer 100mm to compact 63mm height on 45-6750

Code: 45-6750/25



Spacer 150mm to compact 63mm height on 45-6750

Code: 45-6750/26



Specimen Extruder

Code: 45-6710

www.ele.com +44 (0)1525 249 200





Specimen Temperature Measurement

Code: 45-6750/19



100mm Dia mould & platens

Code: 45-6750/10

Product Group: Moulds for Gyratory Compactors

34 x 18.5 x 18.5 cms



Spacer 100mm to compact 63mm height on 45-6750

Code: 45-6750/25

Product Group: Moulds for Gyratory Compactors

34 x 18.5 x 18.5 cms

www.ele.com 🚆 +44 (0)1525 249 200 📕 +1 (800) 323 1242 Page 41 of 58



Specimen Extruder

Code: 45-6710

Product Group: Accessories for Gyratory Compactor



Small air compressor for 45-6750

Code: 45-6750/28

Product Group: Accessories for Gyratory Compactor

Compressed air supply 7-10 bar, 350 Litres per

minute



150mm Dia mould & platens

Code: 45-6750/12

Product Group: Moulds for Gyratory Compactors

34 x 18.5 x 18.5 cms

Page 45 of 58



Spacer 150mm to compact 63mm height on 45-6750

Code: 45-6750/26

Product Group: Moulds for Gyratory Compactors



150 mm filter papers (pack of 100)

Code: 45-6750/22

Product Group: Moulds for Gyratory Compactors

150 mm x 150 mm



PRD Split Mould and Baseplate

Code: 47-0450

Product Group: Percentage Refusal Density (PRD)

Standards

EN 12697-32, EN 13280-4, BS 598-104

Further Information

NOT AVAILABLE FOR SALE IN THE USA

Accessories



300 mm Shank

Code: 47-0480



Vibrating Hammer

Code: 47-0455/01

www.ele.com +44 (0)1525 249 200



Vibrating Hammer

Code: 47-0455/01

Product Group: Percentage Refusal Density (PRD)

Accessory - suitable for compacting asphalt samples.

Standards

EN 12697-32, EN 13280-4, BS 598-104

Further Information

NOT AVAILABLE FOR SALE IN THE USA

Accessories



250 Asphalt Probe

Code: 47-0202/10



300 mm Shank

Code: 47-0480



Cradle

Code: 34-8105

www.ele.com +44 (0)1525 249 200



Engineer's Steel Rule

Code: 81-0805



Filter Paper - Medium

Code: 82-7901



Paraffin Wax

Code: 82-7031



Spatula 200 mm

Code: 81-0140



Vernier Caliper (LCD) Range 0 to 200mm X 0.01mm

Code: 81-0590

Alternatives

www.ele.com # +44 (0)1525 249 200 # +1 (800) 323 1242 Page 49 of 58



250 Asphalt Probe

Code: 47-0202/10



300 mm Shank

Code: 47-0480



Cradle

Code: 34-8105



Engineer's Steel Rule

Code: 81-0805



Filter Paper - Medium

Code: 82-7901



Paraffin Wax

Code: 82-7031

www.ele.com +44 (0)1525 249 200



Spatula 200 mm

Code: 81-0140



Vernier Caliper (LCD) Range 0 to 200mm X 0.01mm

Code: 81-0590



300 mm Shank

Code: 47-0480

Product Group: Percentage Refusal Density (PRD)

Complete with tamping feet - 102 mm and 146 mm

dia.

Standards

EN 12697-32, EN 13280-4, BS 598-104

Further Information

NOT AVAILABLE FOR SALE IN THE USA

Accessories



Vibrating Hammer

Code: 47-0455/01

Alternatives



Vibrating Hammer

Code: 47-0455/01

www.ele.com +44 (0)1525 249 200



Paraffin Wax

Code: 82-7031

Product Group: Chemicals, Test and Reference

Materials

No hazard (congealing point approx 49°C). 5 kg

block.

Further Information

NOT AVAILABLE FOR SALE IN THE USA

Accessories



Vibrating Hammer

Code: 47-0455/01

Alternatives



Vibrating Hammer

Code: 47-0455/01



Polythene Bag - Pack of 50

Code: 81-4775

Product Group: Miscellaneous Laboratory Hardware

Further Information

NOT AVAILABLE FOR SALE IN THE USA



Filter Paper Equivalent to Whatman No 5 150mm Dia Box of 100.

Code: 24-9250

Product Group: Filter Paper, ASTM/AASHTO CBR

mould accessories

Box of 100.

Standards

ASTM D1883, AASHTO T193

Specification

Grade Coarse.

Size 15 cm diam. $(5.9 \hat{a} \mathbb{D})$. Weight Net 8 oz. (22 7 g).

Accessories



Filter Screen 150mm Dia with 0.15mm Mesh.

Code: 24-9240

Alternatives



Filter Screen 150mm Dia with 0.15mm Mesh.

Code: 24-9240

www.ele.com # +44 (0)1525 249 200 # +1 (800) 323 1242



Filter Paper - Fast

Code: 82-7861

Product Group: Filter Papers (Box of 100)

No. 55 x 400 mm diameter.

Further Information

NOT AVAILABLE FOR SALE IN THE USA



Sodium Sulphate

Code: 82-7171

Product Group: Chemicals, Test and Reference

Materials

Anhydrous. No hazard. 3 kg

Further Information

NOT AVAILABLE FOR SALE IN THE USA



Standard Sand - 600/300 µm

Code: 82-7401

Product Group: Sand Cone 6", Chemicals, Test and

Reference Materials

Fraction C. No hazard. 20 kg.

Further Information

NOT AVAILABLE FOR SALE IN THE USA

Accessories



Density Plate for EL29-4300.

Code: 29-4340

Alternatives



Density Plate for EL29-4300.

Code: 29-4340

www.ele.com +44 (0)1525 249 200