

No.2230

Test calender

Calendering is performed in the finishing process of raw paper or coated paper. This process gives gloss to paper surface, improves smoothness and adjusts sheet thickness. Various mechanical constructions and roll composition are used for specific purposes. They are classified broadly into three kinds of combination: metal and metal rolls (machine calender), metal and elastic rolls (super calender), and metal and resin rolls (soft or gloss calender). It is desirable to select a test calender most suitable for the intended purpose, considering many items including material used, paper width, linear pressure, temperature, pressurizing method, heating method, sheet paper or continuous paper.

Simplified super calender 25FC-100E

Roll composition: two rolls (steel, elastic)

Steel roll: 150mm in diameter, surface length 340mm, special alloy steel, surface hardness Hs $86^{\circ} + 2^{\circ}$, hard chrome-plated and polished

Elastic roll: 220mm in diameter, surface length 330mm; special white cotton roll, hardness (D type) $86^{\circ} + 2^{\circ}$

Effective surface length: 250mm

Linear pressure: 200 to 1000N/cm steplessly variable (in 250mm width)

Pressing method: pneumatic

Pressurization: each sheet

Press speed: 3 to 12m/min.

Roll surface temperature: max. 120° C

Power source: three-phase 200/220VAC 15A

Air source: 0.5MPa

Outer dimensions: calender 1185 x 555 x 1385mm,
control panel 730 x 580 x 1175mm

Instrument weight: calender 545kg,
control panel 92kg

Simplified machine calender 25FF-100E

Roll composition: two rolls (steel, steel)

Steel roll: 150mm in diameter, special alloy steel, hard chrome- plated and polished

Effective surface length: 250mm

Linear pressure: 200 to 1000N/cm, steplessly variable (in 250mm width)

Pressing method: pneumatic

Roll heating: electric heating system

Press method: each paper sheet

Press speed: 3 to 12m/min.

Accessories: one set of control panel

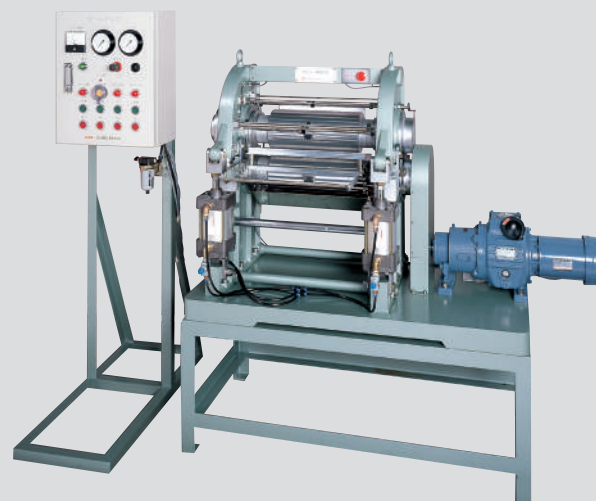
Roll surface temperature: max. 200° C

Power source: three-phase 200/220VAC 15A

Air source: 0.5MPa

Outer dimensions: calender 1185 x 555 x 1385mm
control panel 730 x 580 x 1175mm

Instrument weight: calender 550kg,
control panel 95kg





Super calender 30FC-200E

Roll composition: two rolls (steel, elastic)

Steel roll: 190mm in diameter, surface length 340mm, made of special alloy steel, hardness Hs 87° + 3; hard chrome-plated and polished surface

Elastic roll: 250mm in diameter, surface length 330mm, special white cotton roll (or resin roll)

Effective surface length: 300mm

Line pressure: 400 to 2000N/cm, steplessly variable (in 300mm width)

Pressurization: each sheet paper (unwinding/winding device is optional)

Pressing method: pneumatic, pin joint

Press speed: 3 to 12m/min., steplessly variable

Roll surface temperature: room temperature to 120° C

Roll heating: electric, with heater inside steel roll

Heater: single-phase 200VAC 1.5kW 7.5A

Temperature control: PID control (slide regulator: optional)

Roll driving motor: three-phase 200VAC 50/60Hz 1.5kW 7A

Accessories: one set of control panel

Power source: three-phase 200/220VAC 15A

Air source: 0.5MPa

Outer dimensions: calender 1480 x 970 x 1610mm,
control panel 735 x 670 x 1230mm

Instrument weight: calender 931kg,
control panel 95kg



No.2232

Small-size calender

This machine is used to adjust the density or smoothness of ordinary paper and handmade paper. It can be easily operated in the laboratory. Machine configuration: provided with two or three hard steel rolls, and a simple hydraulic system; the specimen is pressurized by operating the handle. The paper end is fed into the nip, by sliding the paper placed on the specimen table.

Roll: 80or 100, (150 option)mm in diameter, 250mm long, made of SUS or hard chrome-plated and polished

Press speed: 2.5 to 10m/min., steplessly variable

Line pressure: max. 150N/cm

Pressing: hydraulic, manually operated

Pressure gauge: 3MPa

Motor: three-phase 200/220VAC 0.4kW

Outer dimensions: 640 x 535 x 1340mm

Instrument weight: 173kg