

Technical sheet :

# ES 316 L EASY

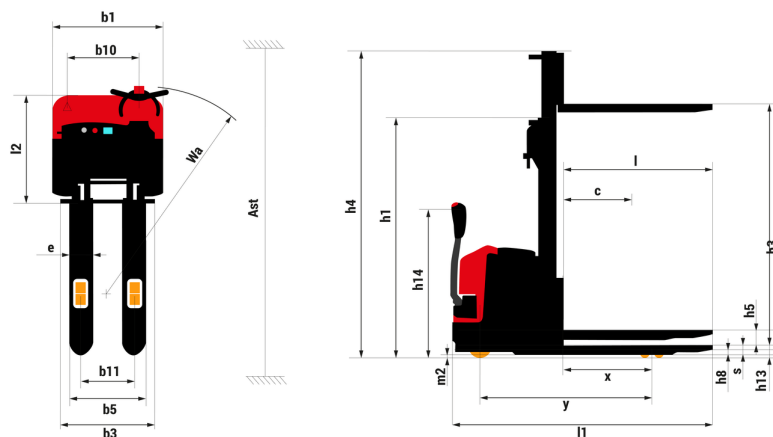
OXYGEN



 **MANITOU**  
HANDLING YOUR WORLD

|      | Technical characteristics                                                                 |           | Metric                   |
|------|-------------------------------------------------------------------------------------------|-----------|--------------------------|
| 1.1  | Manufacturer                                                                              |           | MANITOU                  |
| 1.2  | Model Name                                                                                |           | ES 316 L Easy            |
| 1.3  | Power source                                                                              |           | Electrical - Lithium     |
| 1.4  | Operator type                                                                             |           | Walking alongside        |
| 1.5  | Max. capacity                                                                             | Q         | 1600 kg                  |
| 1.6  | Load center of gravity                                                                    | c         | 600 mm                   |
| 1.8  | Load distance, centre of drive axle to fork (low/raised) - Low position / Raised position | x / x     | 768 mm / 700 mm          |
| 1.9  | Wheelbase                                                                                 | y         | 1455 mm                  |
|      | <b>Weight</b>                                                                             |           |                          |
| 2.1  | Service weight                                                                            |           | 1120 kg                  |
| 2.2  | Weight on front axle (laden) / rear axle (laden)                                          |           | 930 kg / 1790 kg         |
| 2.3  | Weight on front axle (Unladen) / rear axle (Unladen)                                      |           | 760 kg / 360 kg          |
|      | <b>Wheels</b>                                                                             |           |                          |
| 3.1  | Tires type                                                                                |           | Polyurethane cushion     |
| 3.3  | Number of load wheels / Size of load wheels                                               |           | 4 / 83X73                |
| 3.4  | Number of stabilizer wheels / Size of the stabilizer wheels                               |           | 1 / 140X55               |
| 3.5  | Number of front wheels / rear wheels                                                      |           | 2 / 4                    |
| 3.2  | Size of drive wheels                                                                      |           | 250X80                   |
| 3.6  | Front wheel gauge                                                                         | b10       | 510 mm                   |
| 3.7  | Rear wheel gauge                                                                          | b11       | 385 mm                   |
|      | <b>Dimensions</b>                                                                         |           |                          |
| 4.10 | Height of wheel arms                                                                      | h8        | 80 mm                    |
| 4.15 | Fork height in low position                                                               | h13       | 90 mm                    |
| 4.19 | Overall length                                                                            | l1        | 2000 mm                  |
| 4.20 | Length to face of forks                                                                   | l2        | 850 mm                   |
| 4.21 | Overall width                                                                             | b1        | 800 mm                   |
| 4.22 | Forks section / width / length                                                            | s / e / l | 65 mm / 185 mm / 1150 mm |
| 4.24 | Fork carriage width                                                                       | b3        | 680 mm                   |
| 4.25 | Forks spread                                                                              | b5        | 570 mm                   |
| 4.32 | Ground clearance at centre of wheelbase                                                   | m2        | 15 mm                    |
| 4.33 | Aisle Width for pallets 1000 x 1200 crossways                                             | Ast       | 2528 mm                  |
| 4.34 | Aisle width for 800 x 1200 pallet lengthways                                              | Ast       | 2474 mm                  |
| 4.6  | Initial lift                                                                              | h5        | 125 mm                   |
| 4.35 | Turning radius                                                                            | Wa        | 1685 mm                  |
| 4.9  | Height tiller min. / max.                                                                 | h14 / h14 | 790 mm / 1205 mm         |
|      | <b>Performances</b>                                                                       |           |                          |
| 5.1  | Travel speed (laden / unladen)                                                            |           | 6 km/h / 6 km/h          |
| 5.2  | Lifting speed (laden / unladen)                                                           |           | 0.18 m/s / 0.40 m/s      |
| 5.3  | Lowering speed (laden / unladen)                                                          |           | 0.45 m/s / 0.40 m/s      |
| 5.8  | Max Gradeability (laden / unladen)                                                        |           | 6 % / 16 %               |
| 5.10 | Service brake                                                                             |           | Electro magnetic         |
|      | <b>Engine</b>                                                                             |           |                          |
| 6.1  | Drive motor rating S2 60 min                                                              |           | 2.20 kW                  |
| 6.2  | Lift motor rating at S3 15%                                                               |           | 4.20 kW                  |
| 6.4  | Battery voltage / capacity                                                                |           | 48 V / 105 Ah            |
|      | Battery technology                                                                        |           | Lithium-ion              |
| 6.5  | Battery weight (+/- 5%)                                                                   |           | 65 kg                    |

## ES 316 L Easy - Dimensional drawing



# Characteristics of masts and residual capacities

| Full Visibility Duplex (FVD)    |    | FVD 29 | FVD 35 |
|---------------------------------|----|--------|--------|
| h1 - Mast lowered height        | mm | 1990   | 2290   |
| h2 - Mast free lift             | mm | 90     | 90     |
| h3 - Mast lifting height        | mm | 2900   | 3500   |
| h4 - Mast extended height       | mm | 3440   | 4040   |
| Residual capacity at max height | kg | 1200   | 930    |
| Height at max capacity          | mm | 2490   | 2490   |

| Free Lift Triplex (FLT)         |    | FLT 42 | FLT 55 |
|---------------------------------|----|--------|--------|
| h1 - Mast lowered height        | mm | 1890   | 2330   |
| h2 - Mast free lift             | mm | 1390   | 1830   |
| h3 - Mast lifting height        | mm | 4200   | 5500   |
| h4 - Mast extended height       | mm | 4720   | 6020   |
| Residual capacity at max height | kg | 780    | 480    |
| Height at max capacity          | mm | 2490   | 2490   |

# Equipment

| Standard                                                 |
|----------------------------------------------------------|
| Battery - 5.04kWh - Lithium-ion                          |
| Onboard charger - 0.96kW AC - Lithium-ion - Single-phase |
| Pincode - On tiller                                      |
| Polyurethane tandem-load wheels                          |

| Optional                                                 |
|----------------------------------------------------------|
| Cold environment (from -28°C (-18°F))                    |
| External charger - 2.4kW AC - Lithium-ion - Single-phase |
| Key switch entry                                         |
| Soft polyurethane drive wheel - 75 shore                 |



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