

# SY50U

## PRODUCT SPECIFICATIONS



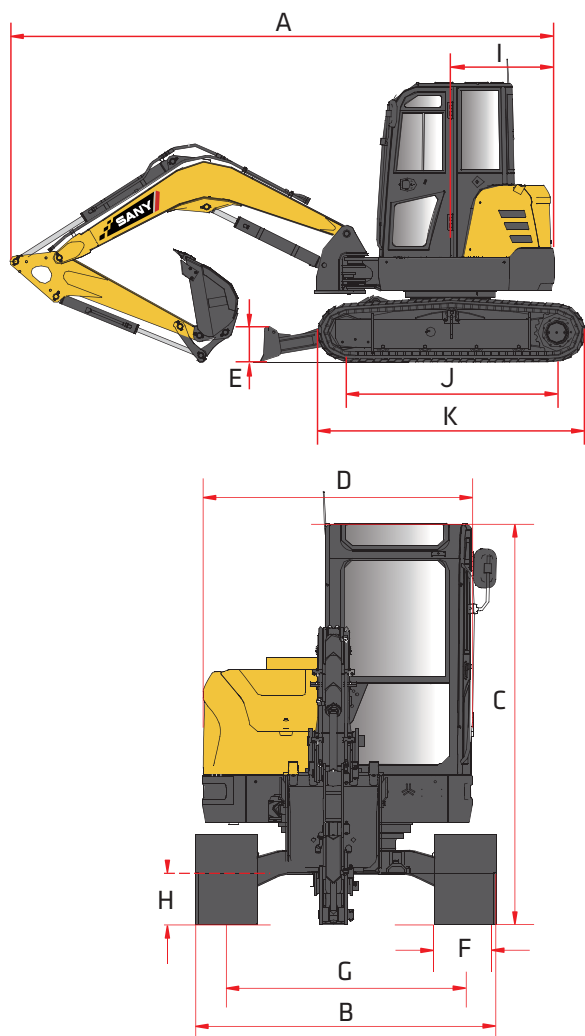
## STANDARD FEATURES

- The tier 4 final power plant, advanced SLSS hydraulic system, optimal power control and work mode selection improve speed and power while reducing fuel consumption
- Zero tail swing radius and independent boom swing allow operation in extremely confined spaces. This allows operation in locations that were previously inaccessible
- Easily accessible service points and a detachable radiator screen are among the features that make scheduled maintenance more convenient

- ➔ **Gross Power**  
29.1 kW / 39.0 hp
- ➔ **Dig Depth**  
3420 mm / 11' 3"
- ➔ **Operating Weight**  
5300 kg / 11,684 lb
- ➔ **Bucket Breakout**  
32.5 kN / 7,306 lbf

# SY50U || PRODUCT SPECIFICATIONS

## DIMENSIONS



## DIMENSIONS

|                               |         |        |
|-------------------------------|---------|--------|
| Boom Length                   | 2700 mm | 8' 10" |
| Stick (Arm) Length            | 1500 mm | 4' 11" |
| A Transport Length            | 5390 mm | 17' 8" |
| B Transport Width             | 1960 mm | 6' 5"  |
| C Transport Height            | 2630 mm | 8' 8"  |
| D Upper Structure Width       | 1760 mm | 5' 9"  |
| E Blade Height                | 330 mm  | 13"    |
| F Track Width (standard shoe) | 400 mm  | 16"    |
| G Track Gauge                 | 1560 mm | 5' 1"  |
| H Ground Clearance (minimum)  | 325 mm  | 13"    |
| I Tail Swing Radius           | 980 mm  | 3' 3"  |
| J Track Length on Ground      | 1990 mm | 6' 6"  |
| K Track Length                | 2510 mm | 8' 3"  |

Zero tail swing radius  
and independent  
boom swing

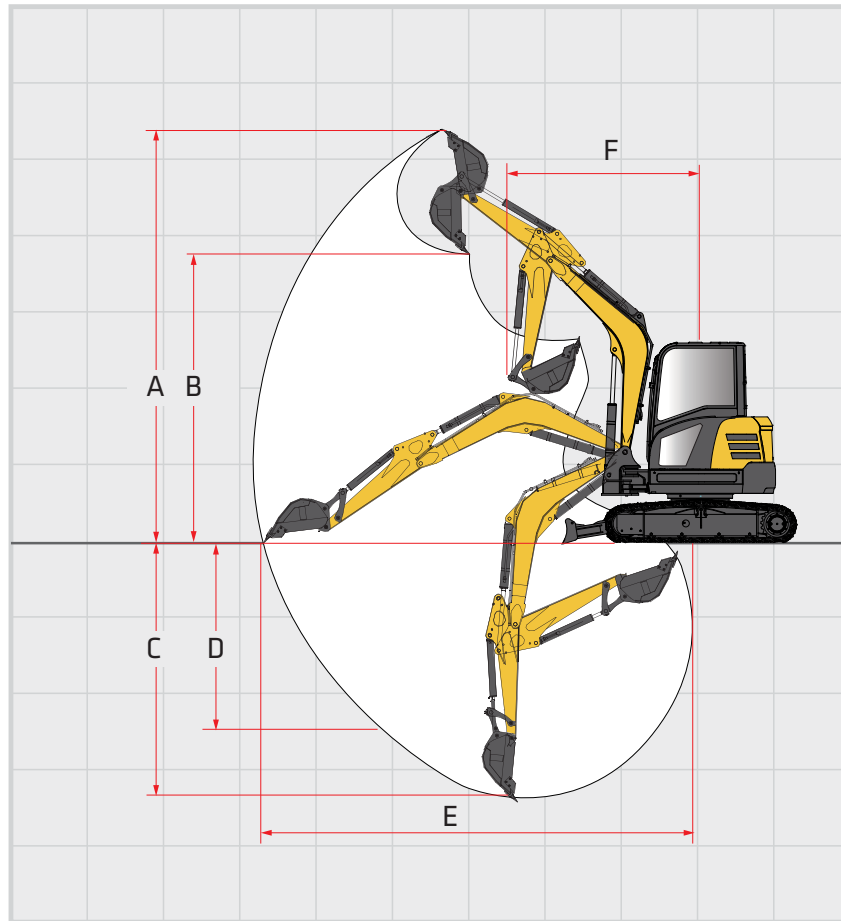
## TECHNICAL SPECIFICATIONS

|                                 |                                      |                       |
|---------------------------------|--------------------------------------|-----------------------|
| Operating Weight                | 5,300 kg                             | 11,684 lb             |
| Ground Pressure                 | 31.6 kPa                             | 4.6 psi               |
| <b>Engine</b>                   | Yanmar 4TNV88C                       |                       |
| Displacement                    | 2.2 L                                | 134.3 in <sup>3</sup> |
| Gross Power                     | 29.1 kW                              | 39.0 HP               |
| <b>Hydraulics</b>               | Load Sensing with Pilot Control      |                       |
| Main Hydraulic Pump             | Axial Piston - Variable Displacement |                       |
| Operating Flow (maximum)        | 110.0 L/min                          | 29.1 gal/min          |
| Operating Pressure (maximum)    | 24.5 MPa                             | 3553 psi              |
| <b>Travel Motor</b>             | Axial Piston with Park Brake         |                       |
| Travel Pressure (maximum)       | 24.5 MPa                             | 3553 psi              |
| Travel Speeds (maximum)         | 2.7 / 4.0 km/hr                      | 1.7 / 2.5 mph         |
| Travel Effort (maximum)         | 40.7 kN                              | 9,150 lbf             |
| Grade Capability (maximum)      | 35°                                  |                       |
| <b>Swing Motor</b>              | Axial Piston with Swing Brake        |                       |
| Swing Pressure (maximum)        | 19.1 MPa                             | 2770 psi              |
| Swing Speed (maximum)           | 10 RPM                               |                       |
| <b>Undercarriage (standard)</b> | Belted Rubber Track                  |                       |
| Track Shoe width (standard)     | 400 mm                               | 16"                   |
| Track Rollers (per side)        | 4                                    |                       |
| Carrier Rollers (per side)      | 1                                    |                       |

## SERVICE REFILL CAPACITIES

|                         |        |          |
|-------------------------|--------|----------|
| Fuel Tank Capacity      | 78.0 L | 20.6 gal |
| Hydraulic Tank Capacity | 52.0 L | 13.7 gal |
| Engine Oil Capacity     | 7.4 L  | 2.0 gal  |
| Cooling System Capacity | 4.2 L  | 1.1 gal  |

## WORKING RANGE



### WORKING RANGE

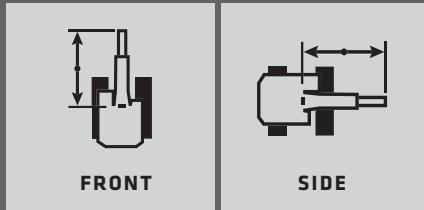
|                                       |         |         |
|---------------------------------------|---------|---------|
| Boom Length                           | 2700 mm | 8' 10"  |
| Stick (Arm) Length                    | 1500 mm | 4' 11"  |
| A Maximum Digging Height              | 5450 mm | 17' 11" |
| B Maximum Dumping Height              | 3805 mm | 12' 6"  |
| C Maximum Digging Depth               | 3420 mm | 11' 3"  |
| D Maximum Vertical Wall Digging Depth | 2460 mm | 8' 1"   |
| E Maximum Reach at Ground Level       | 5880 mm | 19' 3"  |
| F Minimum Swing Radius                | 2520 mm | 8' 3"   |

### DIGGING PERFORMANCE

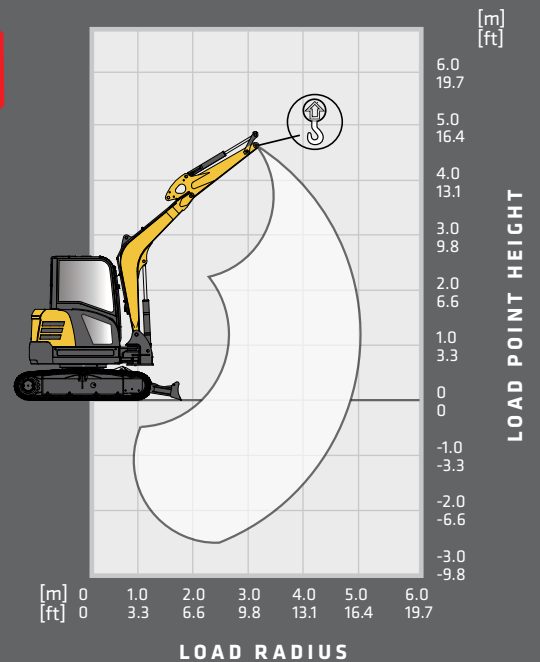
|                                 |         |           |
|---------------------------------|---------|-----------|
| Boom Length                     | 2700 mm | 8' 10"    |
| Stick (Arm) Length              | 1500 mm | 4' 11"    |
| Bucket Breakout Force (ISO)     | 32.5 kN | 7,306 lbf |
| Stick (Arm) Digging Force (ISO) | 22.9 kN | 5,148 lbf |

# SY500 || LIFTING PERFORMANCE

Standard 2700 mm (8' 10") Boom  
 Standard 1500 mm (4' 11") Arm  
 Standard 400 mm (16") Track Shoes  
 No Bucket



Ratings are based on ISO 10567:2007.  
 Lift capacity does not exceed 75% of tipping load with the machine on firm, level ground or 87% of hydraulic lifting capacity.



## BLADE DOWN

| LOAD RADIUS       | 2.0 m<br>6.6 ft       |                     | 3.0 m<br>9.8 ft       |                     | 4.0 m<br>13.1 ft      |                    | 5.0 m<br>16.4 ft      |                    | MAX REACH             |                    |
|-------------------|-----------------------|---------------------|-----------------------|---------------------|-----------------------|--------------------|-----------------------|--------------------|-----------------------|--------------------|
| LOAD POINT HEIGHT |                       |                     |                       |                     |                       |                    |                       |                    |                       |                    |
| 4.0 m<br>13.1 ft  |                       |                     |                       |                     |                       |                    |                       |                    | 1085 kg*<br>2,387 lb* | 845 kg<br>1,859 lb |
| 3.0 m<br>9.8 ft   |                       |                     |                       |                     | 1050 kg*<br>2,310 lb* | 815 kg<br>1,793 lb |                       |                    | 1050 kg*<br>2,310 lb* | 655 kg<br>1,441 lb |
| 2.0 m<br>6.6 ft   |                       |                     | 1545 kg*<br>3,399 lb* | 1190 kg<br>2,618 lb | 1190 kg*<br>2,618 lb* | 790 kg<br>1,738 lb |                       |                    | 1055 kg*<br>2,321 lb* | 580 kg<br>1,276 lb |
| 1.0 m<br>3.3 ft   |                       |                     | 2020 kg*<br>4,444 lb* | 1110 kg<br>2,442 lb | 1365 kg*<br>3,003 lb* | 760 kg<br>1,672 lb | 1080 kg*<br>2,376 lb* | 560 kg<br>1,232 lb | 1075 kg*<br>2,365 lb* | 555 kg<br>1,221 lb |
| 0 m<br>0 ft       |                       |                     | 2165 kg*<br>4,763 lb* | 1075 kg<br>2,365 lb | 1445 kg*<br>3,179 lb* | 735 kg<br>1,617 lb |                       |                    | 1100 kg*<br>2,420 lb* | 575 kg<br>1,265 lb |
| -1.0 m<br>-3.3 ft | 2735 kg*<br>6,017 lb* | 2000 kg<br>4,400 lb | 1975 kg*<br>4,345 lb* | 1075 kg<br>2,365 lb | 1325 kg*<br>2,915 lb* | 735 kg<br>1,617 lb |                       |                    | 1100 kg*<br>2,442 lb* | 655 kg<br>1,441 lb |
| -2.0 m<br>-6.6 ft | 2135 kg*<br>4,697 lb* | 2050 kg<br>4,510 lb | 1370 kg*<br>3,014 lb* | 1100 kg<br>2,420 lb |                       |                    |                       |                    | 1040 kg*<br>2,288 lb* | 905 kg<br>1,991 lb |

\* Indicates load limited by hydraulic lifting capacity

## BLADE UP

| LOAD RADIUS       | 2.0 m<br>6.6 ft       |                     | 3.0 m<br>9.8 ft       |                     | 4.0 m<br>13.1 ft   |                    | 5.0 m<br>16.4 ft   |                    | MAX REACH             |                    |
|-------------------|-----------------------|---------------------|-----------------------|---------------------|--------------------|--------------------|--------------------|--------------------|-----------------------|--------------------|
| LOAD POINT HEIGHT |                       |                     |                       |                     |                    |                    |                    |                    |                       |                    |
| 4.0 m<br>13.1 ft  |                       |                     |                       |                     |                    |                    |                    |                    | 1025 kg<br>2,255 lb   | 845 kg<br>1,859 lb |
| 3.0 m<br>9.8 ft   |                       |                     |                       |                     | 985 kg<br>2,167 lb | 815 kg<br>1,793 lb |                    |                    | 790 kg<br>1,738 lb    | 655 kg<br>1,441 lb |
| 2.0 m<br>6.6 ft   |                       |                     | 1485 kg<br>3,267 lb   | 1190 kg<br>2,618 lb | 960 kg<br>2,112 lb | 790 kg<br>1,738 lb |                    |                    | 700 kg<br>1,540 lb    | 580 kg<br>1,276 lb |
| 1.0 m<br>3.3 ft   |                       |                     | 1400 kg<br>3,080 lb   | 1110 kg<br>2,442 lb | 925 kg<br>2,035 lb | 760 kg<br>1,672 lb | 680 kg<br>1,496 lb | 560 kg<br>1,232 lb | 675 kg<br>1,485 lb    | 555 kg<br>1,221 lb |
| 0 m<br>0 ft       |                       |                     | 1360 kg<br>2,992 lb   | 1075 kg<br>2,365 lb | 905 kg<br>1,991 lb | 735 kg<br>1,617 lb |                    |                    | 700 kg<br>1,540 lb    | 575 kg<br>1,265 lb |
| -1.0 m<br>-3.3 ft | 2735 kg*<br>6,017 lb* | 2000 kg<br>4,400 lb | 1355 kg<br>2,981 lb   | 1075 kg<br>2,365 lb | 900 kg<br>1,980 lb | 735 kg<br>1,617 lb |                    |                    | 800 kg<br>1,760 lb    | 655 kg<br>1,441 lb |
| -2.0 m<br>-6.6 ft | 2135 kg*<br>4,697 lb* | 2050 kg<br>4,510 lb | 1370 kg*<br>3,014 lb* | 1100 kg<br>2,420 lb |                    |                    |                    |                    | 1040 kg*<br>2,288 lb* | 905 kg<br>1,991 lb |

\* Indicates load limited by hydraulic lifting capacity