

Reduced Handling, High Throughput.



## SwiStick Automated Suspension Technology

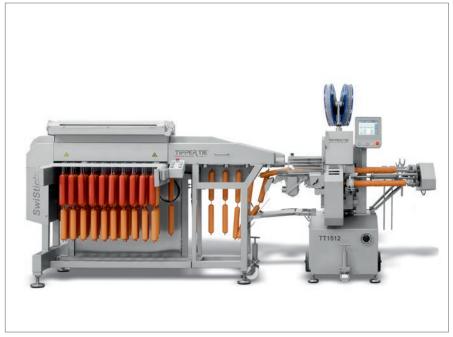
# Flexibility, Productivity, Efficiency

Production flexibility and state-of-the-art automated suspension technology distinguish the Swi-Stick product line. It is the ideal system for efficiently producing portions or strings of sausages. Joined with TIPPER TIE automated double clippers, the robust SwiStick and SwiStickXXL safely and precisely suspend all sausages across a wide variety of casing types, calibers, and string lengths.

### Technical Highlights

Both SwiStick models easily handle sausages in plastic, fibrous, and collagen casings. The base model accommodates calibers from 20 millimeters to 120 millimeters with a maximum sausage/string length of 800 millimeters. Depending on the product, it quickly hangs as many as 100 loops per minute on the smoking sticks. Three sizes are available for smoking stick lengths of 800 millimeters to 1,400 millimeters. SwiStick can be configured individually to a customer's current smoking sticks, eliminating special formats. Up to 22 smoking sticks can be inserted by hand into the motorized magazine. When only a few sticks remain, a visual signal is sent by the monitoring system. If the magazine is emptied, the entire line stops automatically.

For heavy and large sausages, the SwiStickXXL is the sound choice. It accepts the identical caliber range and casing types as the SwiStick, but handles a significantly longer maximum sausage/string length of 1,700 millimeters. Individual sausage or chain weights can vary from 500 grams to 10 kilograms with each smoking stick capable of being loaded with up to 50



SwiStick and TT1512.

kilograms, depending on its quality and workmanship. SwiStickXXL hangs as many as 65 loops per minute, depending on product. A robot or automatic conveyor system can move the heavier filled smoking sticks from the SwiStick-XXL buffer to a smoking trolley. The SwiStickXXL is available for smoking stick lengths of 800 millimeters to 1,200 millimeters and, like SwiStick, it can be configured to a customer's current smoking sticks. Its high capacity, motorized smoking stick magazines hold up to 30 sticks each.

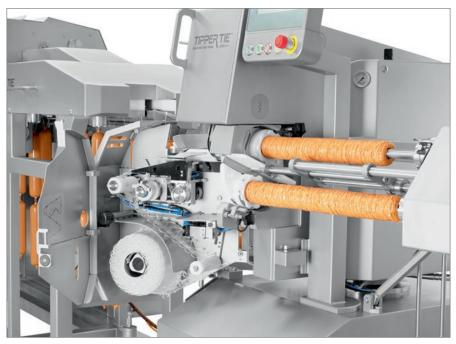
The SwiStick system directly transfers string loops from the string loop feeder of a TIPPER TIE double clipper. The single sausage or string of sausages is placed on a chain of hooks by the conveyor belt and deposited on a smoking stick. Positions of individual string loops are determined through the system control delivering a 25% utilization improvement for each smoking stick, the smoking trolley, and the cooking or smoking chamber.

The efficiency of the smoking stick replacement system is unsurpassed. When the preset number of loops is reached, the filled smoking stick is ejected from the SwiStick into the buffer in only 600 microseconds, and a new smoking stick is supplied from the magazine. The operator removes the filled smoking stick from the buffer and loads it on to the smoking trolley. The buffer has a safety stop that is activated as soon as the delivery table is full.

Both SwiStick models connect easily to a TIPPER TIE double clipper such as the TT1815 or TT1512. To make changing loops or clips easier, the SwiStick does not have to be disconnected. Only the string loop housing has to be opened.

#### Control

The SwiStick line is driven by maintenance-free servo motors and is equipped with a modern PLC control operated via a multilingual graphical touch screen on the double clipper. This innovative operating system is state-of-the-art



Fast clip and loop changes thanks to parallel turret and swivelling string loop housing.

in terms of convenience, hygiene, and efficiency. All settings, like the number of sausages per smoking stick and spacing on the sticks, can be stored in the program for quick recall.

## Hygienic Design & Maintenance

SwiStick is very easy to maintain and service. Smooth, stainless surfaces with a three percent gradient are design elements that allow fast, hygienic cleaning. An integrated safety control system monitors production. In the event of machine error, the system stops the line and the SwiStick, clipper and stuffer go into standby position. Imminent maintenance work is communicated to the operator on the touch screen.

### **Options & Accessories**

For even quicker changeovers, the TIPPER TIE double clipper can be equipped with swivel tube or parallel turret. These options enable the casing to be changed without opening the upper section of the

TT1815 or TT1512. With the parallel turret, while one casing string is running in fill-in position, the free filler tube is swiveled up, and a new casing is fitted and swiveled into the integrated casing brake holder with the casing brake. Changing a casing creates only about two seconds of standstill time for the filling machine, leaving production virtually uninterrupted.

### Single Supplier System

The complete system from one manufacturer – SwiStick, double clipper, clips, loops and labels – ensures fault-free production and increases safety. The alloy, profile, and dimensional accuracy make TIPPER TIE clips the industry standard for secure packages. Products can be labeled individually with various marking types. Colored clips or loops, embossed clips or clipped-in labels are excellent means of product identification.



Motorized smoking stick magazine accommodates 22 smoking sticks.

#### **Customer Value**

- Single operator reduces labor costs
- Meets or exceeds highest safety standards
- Unbeatable flexibility handling a wide range of casing types, calibers, and string lengths
- Highly productive, hanging up to 100 loops per minute
- Configured individually to customer's smoking sticks eliminating special formats
- Delivers measurable utilization improvement for smoking sticks, smoking trolley, and cooking or smoking chamber
- Designed for easy connection to a TIPPER TIE double clipper for ultimate system productivity
- SwiStickXXL model for heavy and large sausages
- Hygienic design for fast, thorough cleaning
- Design features stress reliability and easy maintenance

# SwiStick Family



The buffer has a safety stop which is activated as soon as the delivery table is full.



SwiStick is operated via the touch screen of the TT1815 or TT1512.



#### **Technical Data**

Specifications	SwiStick	SwiStickXXL
Capacity:	up to 100 loops/min	up to 65 loops/min
Caliber range:	Ø 20-120 mm	Ø 20-120 mm
Sausage/string length:	100 mm - 800 mm/130 mm - 800 mm	400 mm - 1.7000 mm/600 mm - 1.700 mm
Smoking stick size:	800 mm - 1.400 mm	800 mm - 1.200 mm
Sausage weight:	100 gr - 4 kg	500 gr - 10 kg (clip holding strength may vary)
Protection class:	IP65	IP65
Fuse protection:	10A at 3x400V/50Hz	10A at 3x400V/50Hz
Power consumption:	2.6kW	2.6kW
Air pressure/air consumption:	6-7 bar / 0.8 Nm <sup>3</sup> /h	6-7 bar / 0.8 Nm <sup>3</sup> /h
Weight:	approx. 550 kg	approx. 1.200 kg
Noise level:	75L <sub>pA</sub> [dB(A)] per EN ISO 11204	75L <sub>pA</sub> [dB(A)] per EN ISO 11204

