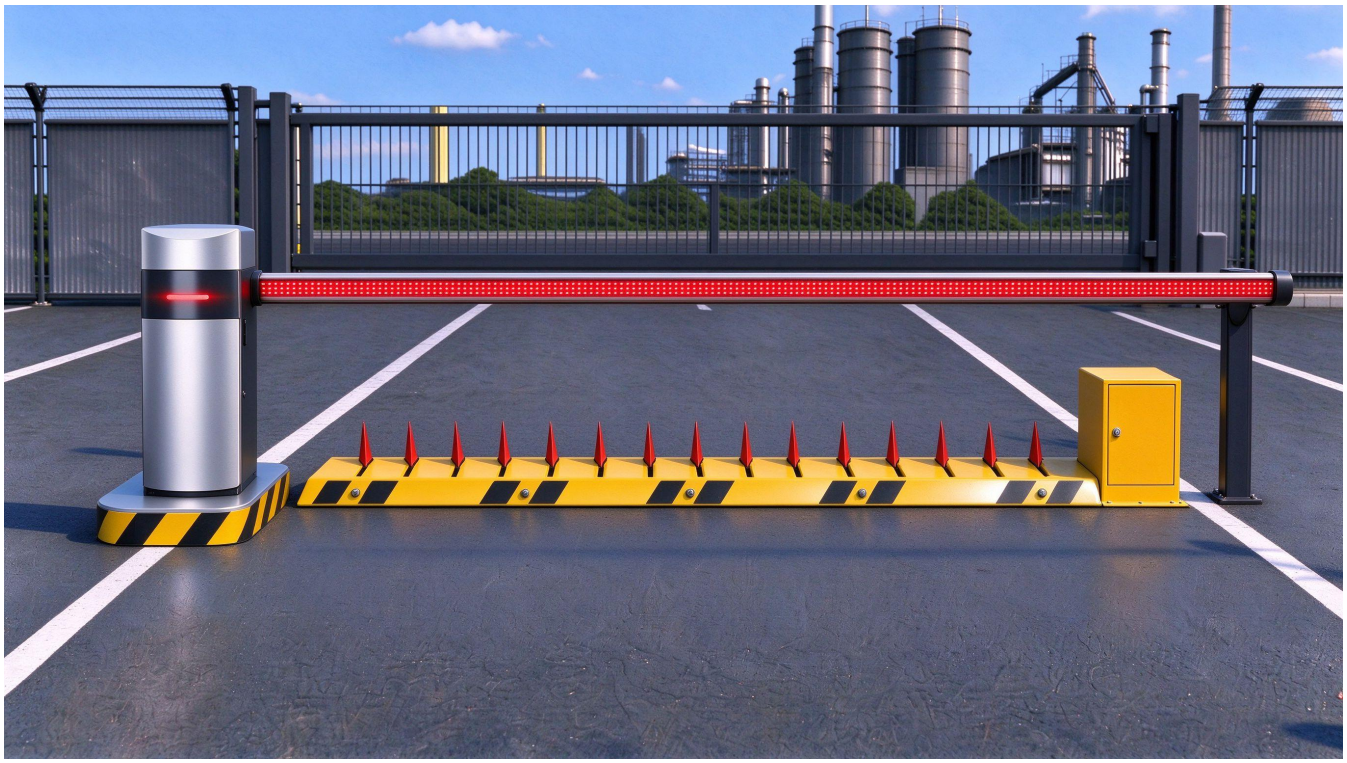
PRODUCT DATASHEET

T9000

Tire Spike Killer

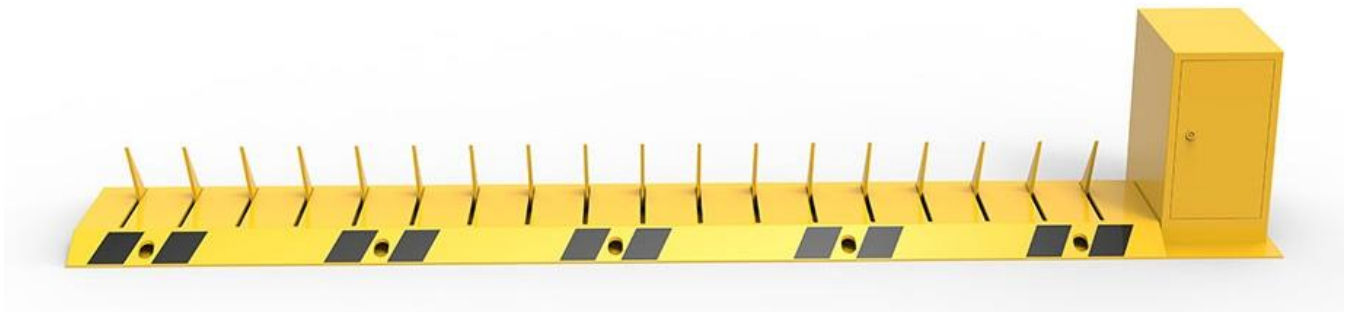
Surface mounted electromechanical tire barrier



Illustrative controlled entrance with a coordinated boom barrier

Spike projection	Raising and lowering	Installation
150 mm	1–3 s each direction	Surface mounted

The T9000 uses motor-driven retractable steel spikes to deter unauthorized vehicle passage at supervised entrances and exits. The spikes lower into the ramped road body for authorized traffic and rise to restore the tire-puncture barrier. Surface mounting allows installation on an existing suitable pavement without a full-width buried mechanism.



SXK-T9000 with raised spikes, reflective markings and end-mounted motor cabinet

Vehicle access control at ground level

Wireless and wired operation • Switching-signal access integration • Manual operation during power loss • Steel body with reflective warning markings

Product features and construction



Ramped steel road body with retractable spikes and cabinet service access

Surface mounting. The road body is anchored directly to flat, sound, hardened pavement through the fixing holes. This avoids the excavation needed for a buried spike mechanism; power and control cable routes are still required.

Motor driven spike movement. An electromechanical drive raises and retracts the spike assembly in approximately one to three seconds per direction. The motor and transmission are located in the cabinet at one end of the body.

Steel spikes and bearing panel. The specified construction uses A3 steel, 10 mm thick spikes and a 12 mm bearing panel. Raised spikes project 150 mm above the body to create the tire-puncture obstacle.

Vehicle passage when retracted. The spikes withdraw into slots in the road body for authorized passage. The surface mounted ramp remains above the pavement, so the approach must suit the vehicle ground clearance and controlled crossing speed.

Visible road edge. The yellow finish and black reflective markings distinguish the equipment across the lane. Anti-rust primer protects the steel beneath the finish; routine cleaning and coating inspection support service life.

Local and remote commands. The controller supports wireless remote operation and wired raise, stop and retract commands. This allows a guard station, push-button control or compatible site controller to operate the equipment.

Manual recovery during power loss. A handwheel inside the motor cabinet allows the spikes to be raised or lowered manually. Site personnel can establish the required lane condition when electrical operation is unavailable.

Maximum stated vehicle passage load is 50 metric tons. Passage load does not describe impact resistance or vehicle stopping distance.

Controls and system integration

A switching command from the site access system can operate the T9000. Configure the complete lane so authorized vehicles cross only after the spikes are fully retracted and restoration occurs only after the monitored zone is clear.



Example lane sequence with compatible access control and detection equipment

Interface or equipment	Supported role	Project requirement
Wireless remote	Raise, stop and retract the spikes	Nominal range 50–100 m in suitable conditions
Wired command inputs	Local push buttons or controller commands	OPEN raises; CLOSE retracts; STOP halts movement
Access or plate recognition system	Authorize passage through a switching signal	Match signal type, pulse behavior and common reference
Boom barrier linkage	Coordinate the arm with the spike position	Arm rising corresponds to spike retraction
Loop detector or infrared device	Vehicle presence and protective input	Configure and test the complete detection zone
Traffic signal	Provide driver stop and proceed indication	12 V DC traffic signal; verify load and switching
Audible warning	Warn of commanded equipment movement	Optional 220 V AC siren; match switching capacity

Coordinated boom and spike control

The lane opens with the boom raised and spikes retracted. For closure, the site controller coordinates lowering the boom and raising the spikes after vehicle clearance. Confirm the actual input mapping, movement timing and detector behavior during commissioning; a shared command alone does not verify that the lane is safe to cross.

Detector inputs and driver information

Compatible loop detectors and infrared devices can support presence detection around the equipment. Use traffic lights, warning signs and any required audible indication to make the lane state clear to drivers. Verify indication against actual spike position before enabling vehicle passage.

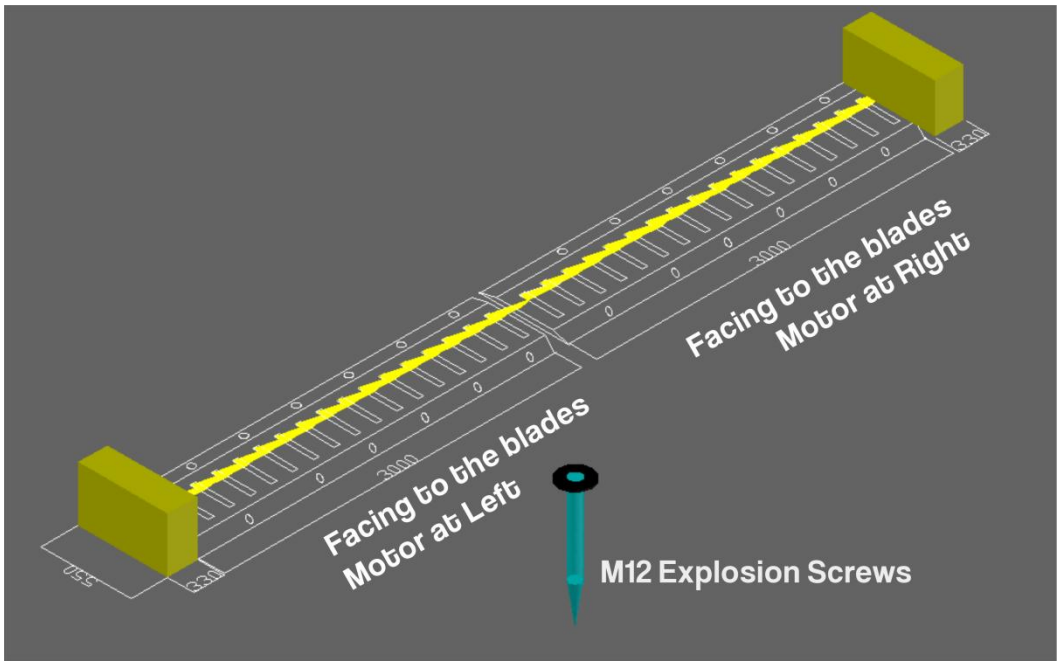
Site system selection

Access readers, plate recognition cameras, detectors, signals and sirens are project accessories. Confirm their electrical loads and interface requirements separately from the 24 V control-circuit specification. Network or cloud functions depend on the external access platform.

Technical specifications

Parameter	Specification
Product model	SXK-T9000
Product type	Automatic retractable tire spike barrier
Installation	Surface mounted; anchored to suitable hardened pavement
Drive mechanism	Electromechanical motor drive in end cabinet
Input supply	220 V AC
Control circuit voltage	24 V nominal
System power	180 W nominal
Raising time	Approximately 1–3 s
Lowering time	Approximately 1–3 s
Spike projection	150 mm above road body
Spike thickness	10 mm
Bearing panel thickness	12 mm
Material and treatment	A3 steel with anti-rust primer; yellow finish as pictured
Nominal body dimensions	3000–6000 × 550 × 80 mm, L × W × H
Maximum passage load	50 metric tons, subject to supplied assembly and pavement
Operating temperature	−40 to +75 °C nominal specified range
Declared ingress protection	IP67 nominal; confirm rated enclosure scope for supplied assembly
Control modes	Wireless remote and wired commands
Remote operating range	50–100 m nominal; environment and interference dependent
Power interruption	Manual raising and lowering using cabinet handwheel
Site integration	Switching-signal access control, boom barrier, vehicle detection and signaling

Dimensions describe the selected nominal body configuration. Confirm overall footprint, cabinet allowance and effective spike coverage on the project drawing. Travel time and operating range depend on the supplied configuration and site conditions.



Applications and site planning

The T9000 is suited to supervised lanes where vehicle authorization, controlled speed and a clear separation from pedestrian routes can be maintained. Match the equipment to the required traffic direction and site security plan.





Illustrative applications at fenced perimeter checkpoints and controlled site entrances

Application	Typical role
Industrial and logistics sites	Control access to factories, warehouses, depots and service yards.
Government and secure compounds	Add a tire-puncture deterrent at supervised vehicle checkpoints.
Airports and transport facilities	Control restricted service and maintenance vehicle entrances.
Utilities and data centers	Manage access to fenced operational areas and plant service lanes.
Controlled parking exits	Deter wrong-way entry where a supervised lane design and warning system are provided.

Installation and commissioning

Install on level, firm pavement with adequate support for the specified traffic load. Set the spike direction correctly, anchor through the fixing holes with the specified M12 expansion anchors, and protect the power and control cable routes. Provide service access to the motor cabinet.

Test raising, retraction, stop commands and manual operation. Commission every detector, linked barrier and driver signal as a complete lane system. Mark the crossing clearly, control approach speed and provide a separate route for pedestrians, cyclists and other vulnerable users.

Maintenance and ordering

Keep spike slots clear of stones and debris. Inspect anchors, spike movement, reflective markings and protective coating; check the motor mechanism and control connections at planned service intervals. Isolate power and secure the lane before maintenance.

Specify SXK-T9000, required body length, effective lane coverage, motor-cabinet side and spike orientation. Confirm the pavement, vehicle loading, power supply, controller interface, detection equipment and required warning devices. Final dimensions, accessory quantities and supply scope follow the confirmed order.

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Product illustrations show example configurations. External lane equipment is specified separately. Specifications and dimensions are subject to the confirmed project configuration. Rev 1.0