

## **RAILWAY TRANSPORTATION SYSTEMS**

## **SELF-RETURNING (SELF-NORMALIZING) POINT MECHANISM MSV**

- Simplification of traffic at secondary lines, sidings, etc.
- Significant manpower saving
- High reliability
- Low maintenance costs



Mechanism of the self-returning (self-normalizing) points (further as MSV only) allows an automatic return of the trailing points to the basic position after point throw-over by the railway vehicle.

If facing point (i.e. for shunting) is required the mechanism of the self-returning point can be excluded from operation by releasing the lock and by throwing over the

slide-bolt from the self-returning mode. Then the points can be operated as usual.

## **Basic Technical Description**

The mechanism basic part is self-operated point machine setup from hydraulic shock absorber with retracting spring, reducer and throwing rod.

The other mechanism units are exchanger with point signal, slide



bolt with checking lock and the end position checking unit for variant with electric check. These units are installed at the mechanism base.

MSV is designed preferably for rail types A, T and S 49 with diameter between 190 and 500 meters, equipped by the hook or the jaw (clamp) lock. MSV enables right or left mounting.

For signalling purposes the MSV mechanism can use the light point signal through the external wiring of the end position checking unit or to generate other dependency (e.g. dependency of the home signal on the point position).

If MSV is equipped by the end position checking unit it also provides the electrical check of the point lock closure in a point basic position.



Self-returning point





## **Basic Technical Parameters**

Railway vehicle speed (during trailing)		max. 40 km/h
Total throw-over interval		13 to 25 sec.
Minimum axle force of the railway vehicle	speed at trailing up to 5 km/h	20 kN
	speed at trailing up to 5 - 40 km/h	26 kN
Maximum point throw-over resistance		1,3 kN
Working temperature range		–40 to +70 °C
Weight (according to variant)		approx. 370 to 391 kg

