

DDS	p186 (MDS)	p187 (encod_1)	p188 (encod_2)	p189 (encod_3)	Encoder for closed-loop position ctrl p2502	Mechanical relationship p2504/ p2505/ p2506 or P2503	Position tracking load gear unit	Switchover behavior
0	0	EDS0	EDS1	EDS2	Geber_1	xxx	activated	---
1	0	EDS0	EDS1	EDS2	Geber_1	xxx	activated	Switchover while the pulses are inhibited or in operation has no effect
2	0	EDS0	EDS1	EDS2	Geber_1	yyy	deactivated	Pulse inhibit/operation: Encoder adjustment and referencing bit are reset. Position tracking for EDS0 is no longer calculated and must be re-adjusted when switching back into DDS0.
3	0	EDS0	EDS1	EDS2	Geber_2	xxx	activated	Pulse inhibit/operation: Position tracking for EDS0 is continued and the referencing bit is reset. (1)
4	0	EDS0	EDS3	EDS2	Geber_2	xxx	activated	Pulse inhibit/operation: Position tracking for EDS0 is continued and the referencing bit is reset. (1)
5	1	EDS4	EDS1	EDS2	Geber_1	xxx	activated	Pulse inhibit/operation: Position tracking for EDS4 is restarted and the referencing bit is reset. (1) When switching back to DDS0 the same applies for EDS0.
6	2	EDS5	EDS6	EDS7	Geber_1	zzz	activated	Pulse inhibit/operation: Position tracking for EDS5 is restarted and the referencing bit is reset. (1) When switching back to DDS0 the same applies for EDS0
7	3	EDS0	EDS1	EDS2	Geber_1	xxx	activated	MDS switchover alone This has no effect when the pulses are inhibited or in operation
8	0	EDS0	EDS1	EDS2	Geber_1	xxx	deactivated	Pulse inhibit/operation: Referencing bit is reset. (1) Position tracking for EDS0 is no longer calculated and as a result the position actual value also changes (offset correction of the position tracking is disabled). When switching back to DDS0, the position tracking for EDS0 restarts and the referencing bit is reset (1). Switching back to DDS0 without a re-adjustment in DDS0 only makes sense if the user had made no new adjustments in DDS8 and the permissible tolerance window (P2722) was not exited.
9	4	EDS6	EDS0	EDS2	Geber_1	www	activated	Pulse inhibit/operation: Position tracking for EDS6 restarts and the referencing bit is reset. (1) When switching back to DDS0 the same applies for EDS0.

Tab. 7-4: DDS switchover with position tracking, load gear unit

Footnote (1):

For a DDS switchover, the referencing bit (r2684.11) is reset. If, in the new DDS, the EDS includes an already adjusted encoder, then the referencing bit is set again.

Terminology:

Position tracking is continued:

The behavior of the position tracking function at the switchover is the same behavior as if the data set hadn't been switched over at all.

Position tracking restarts: (The position actual value can change at switchover!)

The behavior at switchover is the same behavior as after a Power On.

The position value read out of the absolute encoder is compared with the saved position value.

If the position difference lies within the tolerance window (P2722), the position is corrected accordingly; if it lies outside the tolerance window, the corresponding fault message is output.

Position tracking is reset: (The position actual value can change at switchover!)

The saved absolute value is rejected and the overflow counter is set to zero.

Position tracking is not calculated: (The position actual value changes at switchover!)

The saved absolute value of the position tracking including offset correction from the previous DDS is not used.

Additional information: There is only one position tracking memory for each EDS.

Subject to change without prior notice.