



<b>Subject:</b>	<b>Replacement Carriage Ext\Ret Motor</b>
<b>Release Date:</b>	April 16, 2012
<b>Systems Affected:</b>	DSS-200 Series 2 CE, DSS-200 Synergy and Synergy Integra
<b>Reference Components:</b>	12-8882-064 Spin Carriage Extend Retract Motor
<b>Summary:</b>	The current motor lifetime has been steadily decreasing and has been noted to fail on certain platforms between 1 day and 3 months. This upgrade is intended to increase the usable lifetime of the current motor.

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### Background

The lifetime of the original Carriage Motor (12-8882-064) used in the OnTrak DSS-200 Series 2 CE and Synergy products have been steadily decreasing. Specifically, the gear head assembly fails during normal operation, a manual movement, or a hard stop is encountered. Failure analysis has shown that the internal spur gear is shearing teeth and due to problems of this nature occurring in other motors it was decided the same proven replacement motor would be used for this application.

The targeted replacement motor is similar in design to the original Carriage motor with attached quadrature encoder, but the new motor has a planetary gear design versus the spur based gear head. The planetary gear design will provide increased load distribution across the gear set, greater power transmission, and increased rotational stiffness. The new motor will still use the same motor body and encoder which will allow for ease of incorporation into the system. The normalized lifetime of the new motor product line is expected to operate for 1 year or more.

### System Integration

A retrofit kit is required for initial replacement of the motor (retrofit information provided below).

### Recommended Action

A retrofit kit is required for the initial replacement of the motor. After the initial retrofit is installed replacement parts can be ordered individually. The kit listed below is for a Series 2 CE, Synergy, or Synergy Integra system. Each kit replaces the Carriage Extend and Retract motor, the motor mounting bracket, the drive arm, and screws as shown in the picture below.

**Spin Carriage Ext\Ret Retrofit PN 26-8882-901**

