

# COMMAND SYNTAX

To program the Datataker to scan a group of channels requires a single command line of not more than 255 characters. A scan command can contain up to four optional parts: a logger address, a single scan, and two repeat scans. The three parts must always be on one line terminated by a carriage return. It is not possible to edit or append to a command line already entered.

The syntax for a scan command is as follows:

[add] (list {AMM list}) [R list {AMM list}] [R list {AMM list}]]  
address single scan repeat scan 1 repeat scan 2

where

- "add" is logger address if more than one logger is connected eg #1 or ## or #F
- "list" is any valid list of channels, time, day or pulse types eg 19F 1.5V T D 7D = 1100
- "AMM" is the rapid scan specifier for averaging, standard deviation, maximum and/or minimum eg A1S or AMX10S or MM25M
- "R" is the repeat (or report) scan specifier eg R1S or R3E or R2M
- "{ }" curly brackets enclose option(s) which may be repeated eg R1M AMX 1V MX1S 2V
- "[ ]" square brackets enclose optional parts of the command line eg 1V R5S 2V R1M 3V or R2S 2V

## Notes:

- Spaces:** The proper use of spaces in a command line is important. At least one space is required between address, scan specifiers, channel or type members, system commands, etc.
- Case:** Most commands must be in upper case. Switch commands are the only exception where the case determines the action to be taken. Any lower case character not preceded by a "/" is ignored and may be used to improve command readability eg Report10Minute Time 1Volt (note where spaces are present and absent).
- Switch Commands:** May be placed anywhere in a command line provided they are space separated.
- Assignments:** These lie Poke =, Time =, Day =, Outputs etc) are processed only on entry of the command line. They are not repeated if embedded in a repeat schedule eg R1H T 1.5TT P34 = 6 P35 = 7 T = 12:00:00 will set the pokes and time only once and not every hour. The pulse command is the only exception.

## Sample Programs:

Record every hour on the hour the average for the previous hour of the temperature on each of five thermocouples. Day stamp once per day:

```
/S/L  
R24H D R1H A 1.5TT
```

Log the line frequency and time every ten seconds only while the line frequency is below 49.5Hz and greater than 30Hz. Issue a warning when this occurs. If memory fills overwrite the oldest data:

```
///L/O  
1D@7F > 49.5^ JFreq Low^ J"  
2D@7F < 30.0^ Gen Out^ J"  
R10S:1W T 7F
```

Comment: connect digital outputs 1 and 2 to digital input 1 for conditional scanning.

Print the average temperature of each of ten thermocouples in columns with a header and column title at the top of each page.

```
///w/n P22 = 9 ie a tab character  
$ = ^L^M^M^I^I^ITemp (deg C)^M T1^I T1^I T2^I T3^I T4^I T5^I T6^I T7^I T8^I T9^I T10^"  
RR1M $ R1M A 10 19TN
```