Agilent 34980A Multifunction Switch/Measure Unit Command Quick Reference
Version 1.0

Syntax Conventions

- Braces (**{ }**) enclose the parameter choices for a given command string. The braces are not sent with the command string.

- A vertical bar (**|**) separates multiple parameter choices for a given command string.

- Triangle brackets (**< >**) indicate that you must specify a value for the enclosed parameter. The brackets are not sent with the command string. You must specify a value for the parameter (e.g., "VOLT:DC:RANG 10").

- Some parameters are enclosed in square brackets (**[ ]**). The square brackets indicate that the parameter is optional and can be omitted. The brackets are not sent with the command string. If you do not specify a value for an optional parameter, the instrument chooses a default value.

Measurement Commands

MEASure:CURRent:AC? [{<*range*>|AUTO|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]

MEASure:CURRent[:DC]? [{<*range*>|AUTO|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]

MEASure:DIGital[:{BYTE|WORD|LWORd}]? (@<*ch_list*>)

MEASure:DIGital[:BYTE]:BIT? <*bit*>, (@<*ch_list*>)

MEASure:FREQuency? [{<*range*>|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]

MEASure:FRESistance? [{<*range*>|AUTO|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]

MEASure:PERiod? [{<*range*>|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]

MEASure:RESistance? [{<*range*>|AUTO|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]

MEASure:TEMPerature? {TCouple|RTD|FRTD|THERmistor|DEF}, {<*type*>|DEF} [,1 [,{<*resolution*>|MIN|MAX|DEF}]] [, (@<*ch_list*>)]

MEASure:TOTalize? {READ|RRESet}, (@<*ch_list*>)

MEASure[:VOLTage]:AC? [{<*range*>|AUTO|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]

MEASure[:VOLTage][:DC]? [{<*range*>|AUTO|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]

Temperature Configuration Commands

CONFigure:TEMPerature {TCouple|RTD|FRTD|THERmistor|DEF}, {<*type*>|DEF} [,1 [,{<*resolution*>|MIN|MAX|DEF}]]
    [, (@<*ch_list*>)]
CONFigure? [(@<*ch_list*>)]

[SENSe:]TEMPerature:APERture {<*seconds*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:APERture? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]TEMPerature:APERture:ENABled? [(@<*ch_list*>)]

[SENSe:]TEMPerature:NPLC {<*PLCs*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:NPLC? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]TEMPerature:TRANsducer:TYPE {TCouple|RTD|FRTD|THERmistor} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:TYPE? [(@<*ch_list*>)]

[SENSe:]TEMPerature:ZERO:AUTO {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:ZERO:AUTO? [(@<*ch_list*>)]

UNIT:TEMPerature {C|F|K} [, (@<*ch_list*>)]
UNIT:TEMPerature? [(@<*ch_list*>)]

Thermocouple Configuration

[SENSe:]TEMPerature:RJUNction[:INTernal]? (@<*ch_list*>)

[SENSe:]TEMPerature:TRANsducer:TCouple:CHECk {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:TCouple:CHECk? [(@<*ch_list*>)]

[SENSe:]TEMPerature:TRANsducer:TCouple:IMPedance:AUTO
[SENSe:]TEMPerature:TRANsducer:TCouple:IMPedance:AUTO?

[SENSe:]TEMPerature:TRANsducer:TCouple:RJUNction {<*temperature*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:TCouple:RJUNction? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]TEMPerature:TRANsducer:TCouple:RJUNction:EXTernal?

[SENSe:]TEMPerature:TRANsducer:TCouple:RJUNction:TYPE {EXTernal|FIXed|INTernal} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:TCouple:RJUNction:TYPE? [(@<*ch_list*>)]

[SENSe:]TEMPerature:TRANsducer:TCouple:TYPE {B|E|J|K|N|R|S|T} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:TCouple:TYPE? [(@<*ch_list*>)]

RTD Configuration

[SENSe:]TEMPerature:TRANsducer:FRTD:OCOMpensated {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:FRTD:OCOMpensated? [(@<*ch_list*>)]

[SENSe:]TEMPerature:TRANsducer:FRTD:REFerence {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:FRTD:REFerence? [(@<*ch_list*>)]

[SENSe:]TEMPerature:TRANsducer:FRTD:RESistance[:REFerence] {<*reference*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:FRTD:RESistance[:REFerence]? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]TEMPerature:TRANsducer:FRTD:TYPE {85|91} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:FRTD:TYPE? [(@<*ch_list*>)]

[SENSe:]TEMPerature:TRANsducer:RTD:OCOMpensated {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:RTD:OCOMpensated? [(@<*ch_list*>)]

[SENSe:]TEMPerature:TRANsducer:RTD:REFerence {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:RTD:REFerence? [(@<*ch_list*>)]

[SENSe:]TEMPerature:TRANsducer:RTD:RESistance[:REFerence] {<*reference*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:RTD:RESistance[:REFerence]? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]TEMPerature:TRANsducer:RTD:TYPE {85|91} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:RTD:TYPE? [(@<*ch_list*>)]

Thermistor Configuration

[SENSe:]TEMPerature:TRANsducer:THERmistor:REFerence {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:THERmistor:REFerence? [(@<*ch_list*>)]

[SENSe:]TEMPerature:TRANsducer:THERmistor:TYPE {2252|5000|10000} [, (@<*ch_list*>)]
[SENSe:]TEMPerature:TRANsducer:THERmistor:TYPE? [(@<*ch_list*>)]

Voltage Configuration Commands

DC Voltage Configuration

CONFigure[:VOLTage][:DC] [{*<range>*|AUTO|MIN|MAX|DEF} [,{*<resolution>*|MIN|MAX|DEF}] ,] [(@*<ch_list>*)]
CONFigure? [(@*<ch_list>*)]

[SENSe:]VOLTage[:DC]:APERture {*<seconds>*|MIN|MAX|DEF} [, (@*<ch_list>*)]
[SENSe:]VOLTage[:DC]:APERture? [{(@*<ch_list>*)|MIN|MAX}]

[SENSe:]VOLTage[:DC]:APERture:ENABled? [(@*<ch_list>*)]

[SENSe:]VOLTage[:DC]:IMPedance:AUTO *<mode>* [, (@*<ch_list>*)]
[SENSe:]VOLTage[:DC]:IMPedance:AUTO? [(@*<ch_list>*)]

[SENSe:]VOLTage[:DC]:NPLC {*<PLCs>*|MIN|MAX|DEF} [, (@*<ch_list>*)]
[SENSe:]VOLTage[:DC]:NPLC? [{(@*<ch_list>*)|MIN|MAX}]

[SENSe:]VOLTage[:DC]:RANGe {*<range>*|MIN|MAX|DEF} [, (@*<ch_list>*)]
[SENSe:]VOLTage[:DC]:RANGe? [{(@*<ch_list>*)|MIN|MAX}]

[SENSe:]VOLTage[:DC]:RANGe:AUTO {OFF|0|ON|1} [, (@*<ch_list>*)]
[SENSe:]VOLTage[:DC]:RANGe:AUTO? [(@*<ch_list>*)]

[SENSe:]VOLTage[:DC]:RESolution {*<resolution>*|MIN|MAX|DEF} [, (@*<ch_list>*)]
[SENSe:]VOLTage[:DC]:RESolution? [{(@*<ch_list>*)|MIN|MAX}]

[SENSe:]VOLTage[:DC]:ZERO:AUTO {OFF|0|ON|1} [, (@*<ch_list>*)]
[SENSe:]VOLTage[:DC]:ZERO:AUTO? [(@*<ch_list>*)]

AC Voltage Configuration

CONFigure[:VOLTage]:AC [{*<range>*|AUTO|MIN|MAX|DEF} [,{*<resolution>*|MIN|MAX|DEF}] ,] [(@*<ch_list>*)]
CONFigure? [(@*<ch_list>*)]

[SENSe:]VOLTage:AC:BANDwidth {3|20|200|MIN|MAX|DEF} [, (@*<ch_list>*)]
[SENSe:]VOLTage:AC:BANDwidth? [{(@*<ch_list>*)|MIN|MAX}]

[SENSe:]VOLTage:AC:RANGe {*<range>*|MIN|MAX|DEF} [, (@*<ch_list>*)]
[SENSe:]VOLTage:AC:RANGe? [{(@*<ch_list>*)|MIN|MAX}]

[SENSe:]VOLTage:AC:RANGe:AUTO {OFF|0|ON|1} [, (@*<ch_list>*)]
[SENSe:]VOLTage:AC:RANGe:AUTO? [(@*<ch_list>*)]

Resistance Configuration Commands

2-Wire Resistance Configuration

CONFigure:RESistance [{<*range*>|AUTO|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]
CONFigure? [(@<*ch_list*>)]

[SENSe:]RESistance:APERture {<*seconds*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]RESistance:APERture? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]RESistance:APERture:ENABled? [(@<*ch_list*>)]

[SENSe:]RESistance:NPLC {<*PLCs*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]RESistance:NPLC? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]RESistance:OCOMpensated <*mode*> [, (@<*ch_list*>)]
[SENSe:]RESistance:OCOMpensated? [(@<*ch_list*>)]

[SENSe:]RESistance:RANGe {<*range*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]RESistance:RANGe? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]RESistance:RANGe:AUTO {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]RESistance:RANGe:AUTO? [(@<*ch_list*>)]

[SENSe:]RESistance:RESolution {<*resolution*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]RESistance:RESolution? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]RESistance:ZERO:AUTO {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]RESistance:ZERO:AUTO? [(@<*ch_list*>)]

4-Wire Resistance Configuration

CONFigure:FRESistance [{<*range*>|AUTO|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]
CONFigure? [(@<*ch_list*>)]

[SENSe:]FRESistance:APERture {<*seconds*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]FRESistance:APERture? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]FRESistance:APERture:ENABled? [(@<*ch_list*>)]

[SENSe:]FRESistance:NPLC {<*PLCs*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]FRESistance:NPLC? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]FRESistance:OCOMpensated <*mode*> [, (@<*ch_list*>)]
[SENSe:]FRESistance:OCOMpensated? [(@<*ch_list*>)]

[SENSe:]FRESistance:RANGe {<*range*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]FRESistance:RANGe? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]FRESistance:RANGe:AUTO {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]FRESistance:RANGe:AUTO? [(@<*ch_list*>)]

[SENSe:]FRESistance:RESolution {<*resolution*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]FRESistance:RESolution? [{(@<*ch_list*>)|MIN|MAX}]

Current Configuration Commands

DC Current Configuration

CONFigure:CURRent[:DC] [{<range>|AUTO|MIN|MAX|DEF} [,{<resolution>|MIN|MAX|DEF}] ,] [(@<ch_list>)]
CONFigure? [(@<ch_list>)]

[SENSe:]CURRent[:DC]:APERture {<seconds>|MIN|MAX|DEF} [, (@<ch_list>)]
[SENSe:]CURRent[:DC]:APERture? [{(@<ch_list>)|MIN|MAX}]

[SENSe:]CURRent[:DC]:APERture:ENABled? [(@<ch_list>)]

[SENSe:]CURRent[:DC]:NPLC {<PLCs>|MIN|MAX|DEF} [, (@<ch_list>)]
[SENSe:]CURRent[:DC]:NPLC? [{(@<ch_list>)|MIN|MAX}]

[SENSe:]CURRent[:DC]:RANGe {<range>|MIN|MAX|DEF} [, (@<ch_list>)]
[SENSe:]CURRent[:DC]:RANGe? [{(@<ch_list>)|MIN|MAX}]

[SENSe:]CURRent[:DC]:RANGe:AUTO {OFF|0|ON|1} [, (@<ch_list>)]
[SENSe:]CURRent[:DC]:RANGe:AUTO? [(@<ch_list>)]

[SENSe:]CURRent[:DC]:RESolution {<resolution>|MIN|MAX|DEF} [, (@<ch_list>)]
[SENSe:]CURRent[:DC]:RESolution? [{(@<ch_list>)|MIN|MAX}]

[SENSe:]CURRent[:DC]:ZERO:AUTO {OFF|0|ON|1} [, (@<ch_list>)]
[SENSe:]CURRent[:DC]:ZERO:AUTO? [(@<ch_list>)]

AC Current Configuration

CONFigure:CURRent:AC [{<range>|AUTO|MIN|MAX|DEF} [,{<resolution>|MIN|MAX|DEF}] ,] [(@<ch_list>)]
CONFigure? [(@<ch_list>)]

[SENSe:]CURRent:AC:BANDwidth {3|20|200|MIN|MAX|DEF} [, (@<ch_list>)]
[SENSe:]CURRent:AC:BANDwidth? [{(@<ch_list>)|MIN|MAX}]

[SENSe:]CURRent:AC:RANGe {<range>|MIN|MAX|DEF} [, (@<ch_list>)]
[SENSe:]CURRent:AC:RANGe? [{(@<ch_list>)|MIN|MAX}]

[SENSe:]CURRent:AC:RANGe:AUTO {OFF|0|ON|1} [, (@<ch_list>)]
[SENSe:]CURRent:AC:RANGe:AUTO? [(@<ch_list>)]

Frequency and Period Configuration Commands

Frequency Configuration

CONFigure:FREQuency [{<*range*>|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]
CONFigure? [(@<*ch_list*>)]

[SENSe:]FREQuency:APERture {<*seconds*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]FREQuency:APERture? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]FREQuency:RANGe:LOWer {<*timeout*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]FREQuency:RANGe:LOWer? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]FREQuency:VOLTage:RANGe {<*voltage_range*>|AUTO|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]FREQuency:VOLTage:RANGe? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]FREQuency:VOLTage:RANGe:AUTO {OFF|0|ON|1} [, (@<*ch_list*>)]
[SENSe:]FREQuency:VOLTage:RANGe:AUTO? [(@<*ch_list*>)]

Period Configuration

CONFigure:PERiod [{<*range*>|MIN|MAX|DEF} [,{<*resolution*>|MIN|MAX|DEF}] ,] [(@<*ch_list*>)]
CONFigure? [(@<*ch_list*>)]

[SENSe:]PERiod:APERture {<*seconds*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]PERiod:APERture? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]PERiod:VOLTage:RANGe {<*voltage_range*>|MIN|MAX|DEF} [, (@<*ch_list*>)]
[SENSe:]PERiod:VOLTage:RANGe? [{(@<*ch_list*>)|MIN|MAX}]

[SENSe:]PERiod:VOLTage:RANGe:AUTO <*mode*> [, (@<*ch_list*>)]
[SENSe:]PERiod:VOLTage:RANGe:AUTO? [(@<*ch_list*>)]

Digital I/O and Totalizer Configuration Commands

Digital I/O Configuration

CONFigure:DIGital:STATe {INPut|OUTPut}, (@*<ch_list>*)
CONFigure:DIGital:STATe? (@*<ch_list>*)

CONFigure:DIGital:WIDTh {BYTE|WORD|LWORd}, (@*<ch_list>*)
CONFigure:DIGital:WIDTh? (@*<ch_list>*)

[SENSe:]DIGital:DATA[:{BYTE|WORD|LWORd}]? (@*<ch_list>*)

[SENSe:]DIGital:DATA[:BYTE]:BIT? *<bit>*, (@*<ch_list>*)

SOURce:DIGital:DATA[:BYTE|WORD|LWORd] *<data>*, (@*<ch_list>*)
SOURce:DIGital:DATA[:BYTE|WORD|LWORd]? (@*<ch_list>*)

SOURce:DIGital:DATA[:BYTE]:BIT *<bit>*, <0|1>, (@*<ch_list>*)
SOURce:DIGital:DATA[:BYTE]:BIT? *<bit>*, (@*<ch_list>*)

SOURce:DIGital:STATe {INPut|0|OUTPut|1}, (@*<ch_list>*)
SOURce:DIGital:STATe? (@*<ch_list>*)

Totalizer Configuration

CONFigure:TOTalize {READ|RRESet}, (@*<ch_list>*)

[SENSe:]TOTalize:CLEar:IMMediate (@*<ch_list>*)

[SENSe:]TOTalize:DATA? (@*<ch_list>*)

[SENSe:]TOTalize:SLOPe {NEGative|POSitive}, (@*<ch_list>*)
[SENSe:]TOTalize:SLOPe? (@*<ch_list>*)

[SENSe:]TOTalize:THReshold[:MODE] {AC|TTL}, (@*<ch_list>*)
[SENSe:]TOTalize:THReshold[:MODE]? (@*<ch_list>*)

[SENSe:]TOTalize:TYPE {READ|RRESet}, (@*<ch_list>*)
[SENSe:]TOTalize:TYPE? (@*<ch_list>*)

DAC Configuration Commands

OUTPut[:STATe] {OFF|0|ON|1}, (@<ch_list>)
OUTPut[:STATe]? (@<ch_list>)

SOURce:CURRent[:LEVel] {<current>|MIN|MAX|DEF}, (@<ch_list>)
SOURce:CURRent[:LEVel]? [{MIN|MAX},] (@<ch_list>)

SOURce:FUNCtion:TRIGger:SOURce {IMMediate|MANual|EXTernal}, (@<ch_list>)
SOURce:FUNCtion:TRIGger:SOURce? (@<ch_list>)

SOURce:MODE {VOLTage|CURRent}, (@<ch_list>)
SOURce:MODE? (@<ch_list>)

SOURce:MODule:CLOCk:FREQuency {<frequency>|MIN|MAX}, {1|2|3|4|5|6|7|8}
SOURce:MODule:CLOCk:FREQuency? [{MIN|MAX},] {1|2|3|4|5|6|7|8}

SOURce:MODule:CLOCk:STATe {OFF|0|ON|1}, {1|2|3|4|5|6|7|8}
SOURce:MODule:CLOCk:STATe? {1|2|3|4|5|6|7|8}

SOURce:MODule:TRIGger:EXTernal:IMMediate {1|2|3|4|5|6|7|8}

SOURce:MODule:TRIGger:OUTPut {OFF|0|ON|1}, {1|2|3|4|5|6|7|8}
SOURce:MODule:TRIGger:OUTPut? {1|2|3|4|5|6|7|8}

SOURce:VOLTage[:LEVel] {<voltage>|MIN|MAX|DEF}, (@<ch_list>)
SOURce:VOLTage[:LEVel]? [{MIN|MAX},] (@<ch_list>)

Trace Waveform Configuration

SOURce:FUNCtion:CLOCk:EXTernal:DIVisor {<value>|MIN|MAX|DEF}, (@<ch_list>)
SOURce:FUNCtion:CLOCk:EXTernal:DIVisor? [{MIN|MAX},] (@<ch_list>)

SOURce:FUNCtion:CLOCk:SOURce <source>, (@<ch_list>)
SOURce:FUNCtion:CLOCk:SOURce? (@<ch_list>)

SOURce:FUNCtion:CURRent:GAIN {<gain>|MIN|MAX|DEF}, (@<ch_list>)
SOURce:FUNCtion:CURRent:GAIN? [{MIN|MAX},] (@<ch_list>)

SOURce:FUNCtion:CURRent:OFFSet {<offset>|MIN|MAX|DEF}, (@<ch_list>)
SOURce:FUNCtion:CURRent:OFFSet? [{MIN|MAX},] (@<ch_list>)

SOURce:FUNCtion:ENABle {OFF|0|ON|1}, (@<ch_list>)
SOURce:FUNCtion:ENABle? (@<ch_list>)

SOURce:FUNCtion:FREQuency {<frequency>|MIN|MAX|DEF}, (@<ch_list>)
SOURce:FUNCtion:FREQuency? [{MIN|MAX},] (@<ch_list>)

SOURce:FUNCtion:HALT (@<ch_list>)

SOURce:FUNCtion:SAMPle:PERiod {<period>|MIN|MAX|DEF}, (@<ch_list>)
SOURce:FUNCtion:SAMPle:PERiod? [{MIN|MAX},] (@<ch_list>)

SOURce:FUNCtion:TRACe:NCYCles {<count>|MIN|MAX|DEF|INFinity}, (@<ch_list>)
SOURce:FUNCtion:TRACe:NCYCles? [{MIN|MAX},] (@<ch_list>)

SOURce:FUNCtion:TRACe:SINDex <point>, (@<ch_list>)
SOURce:FUNCtion:TRACe:SINDex? (@<ch_list>)

SOURce:FUNCtion:TRACe[:NAME] <name>, (@<ch_list>)
SOURce:FUNCtion:TRACe[:NAME]? (@<ch_list>)

SOURce:FUNCtion:TRIGger:IMMediate (@<ch_list>)

SOURce:FUNCtion:VOLTage:GAIN {<gain>|MIN|MAX|DEF}, (@<ch_list>)
SOURce:FUNCtion:VOLTage:GAIN? [{MIN|MAX},] (@<ch_list>)

SOURce:FUNCtion:VOLTage:OFFSet {<offset>|MIN|MAX|DEF}, (@<ch_list>)
SOURce:FUNCtion:VOLTage:OFFSet? [{MIN|MAX},] (@<ch_list>)

TRACe:CATalog? {1|2|3|4|5|6|7|8}

TRACe:DELete:ALL {1|2|3|4|5|6|7|8}

TRACe:DELete[:NAME] {1|2|3|4|5|6|7|8}, <name>

TRACe:FREE? {1|2|3|4|5|6|7|8}

TRACe:POINts? {1|2|3|4|5|6|7|8}, <name>

TRACe[:DATA] {1|2|3|4|5|6|7|8}, <name>, {<binary_block>|<value>, <value> [,<value>, . . .]}

TRACe[:DATA]:DAC {1|2|3|4|5|6|7|8}, <name>, {<binary_block>|<value>, <value> [,<value>, . . .]}

TRACe[:DATA]:FUNCtion {1|2|3|4|5|6|7|8}, <type>, <name>, <points>

Monitor Commands

ROUTe:MONitor:DATA?

ROUTe:MONitor:MODE {CHANnel|DMM}
ROUTe:MONitor:MODE?

ROUTe:MONitor:STATe {OFF|0|ON|1}
ROUTe:MONitor:STATe?

ROUTe:MONitor[:CHANnel] (@<channel>)
ROUTe:MONitor[:CHANnel]?

ROUTe:MONitor[:CHANnel]:ENABle {OFF|0|ON|1}, (@<ch_list>)
ROUTe:MONitor[:CHANnel]:ENABle? (@<ch_list>)

Scan Configuration Commands

ABORt

INITiate

FORMat:BORDer {NORMal|SWAPped}
FORMat:BORDer?

FORMat:READing:ALARm {OFF|0|ON|1}
FORMat:READing:ALARm?

FORMat:READing:CHANnel {OFF|0|ON|1}
FORMat:READing:CHANnel?

FORMat:READing:TIME {OFF|0|ON|1}
FORMat:READing:TIME?

FORMat:READing:TIME:TYPE {ABSolute|RELative}
FORMat:READing:TIME:TYPE?

FORMat:READing:UNIT {OFF|0|ON|1}
FORMat:READing:UNIT?

READ? [(@<ch_list>)]

ROUTe:CHANnel:DELay {<seconds>|MIN|MAX|DEF}, (@<ch_list>)
ROUTe:CHANnel:DELay? [{MIN|MAX|DEF},] (@<ch_list>)

ROUTe:CHANnel:DELay:AUTO {OFF|0|ON|1}, (@<ch_list>)
ROUTe:CHANnel:DELay:AUTO? (@<ch_list>)

ROUTe:SCAN (@<scan_list>)
ROUTe:SCAN?

ROUTe:SCAN:ADD (@<ch_list>)

ROUTe:SCAN:REMove (@<ch_list>)

ROUTe:SCAN:ORDered {OFF|0|ON|1}
ROUTe:SCAN:ORDered?

ROUTe:SCAN:SIZE?

SAMPle:COUNt {<count>|MIN|MAX|DEF}
SAMPle:COUNt? [{MIN|MAX}]

SWEep:COUNt {<count>|MIN|MAX|DEF}
SWEep:COUNt? [{MIN|MAX}]

TRIGger:COUNt {<count>|MIN|MAX|DEF|INFinity}
TRIGger:COUNt? [{MIN|MAX}]

TRIGger:SOURce {IMMediate|BUS|EXTernal|TIMer}
TRIGger:SOURce?

TRIGger:TIMer {<seconds>|MIN|MAX|DEF}
TRIGger:TIMer? [{MIN|MAX}]

Switch Control Commands

ROUTe:CHANnel:LABel:CLEar:MODule {1-8|SLOT1-SLOT8|ALL}

ROUTe:CHANnel:LABel[:DEFine] "*<label>*" , (@*<ch_list>*)
ROUTe:CHANnel:LABel[:DEFine]? [*<type>*,] (@*<ch_list>*)

ROUTe:CLOSe (@*<ch_list>*)
ROUTe:CLOSe? (@*<ch_list>*)

ROUTe:CLOSe:EXCLusive (@*<ch_list>*)

ROUTe:MODule:BUSY? {1-8|SLOT1-SLOT8|ANY}

ROUTe:MODule:WAIT {1-8|SLOT1-SLOT8|ANY}
ROUTe:MODule:WAIT? {1-8|SLOT1-SLOT8|ANY}

ROUTe:OPEN (@*<ch_list>*)
ROUTe:OPEN? (@*<ch_list>*)

ROUTe:OPEN:ABUS [{*<abus>*|ALL}]

ROUTe:OPEN:ALL [{1-8|SLOT1-SLOT8|ALL}]

ROUTe:OPERation:OVERlap[:ENABle] {OFF|0|ON|1}
ROUTe:OPERation:OVERlap[:ENABle]?

SYSTem:CPON {1|2|3|4|5|6|7|8}

SYSTem:CTYPe? {1|2|3|4|5|6|7|8}

SYSTem:MODule:PFAil:JUMPer:AMP5? {1|2|3|4|5|6|7|8}   (*34937A/938A only*)

SYSTem:MODule:TEMPerature? [{TRANsducer|TTHReshold}], {1|2|3|4|5|6|7|8}   (*34937A/938A only*)

SYSTem:MODule:WIRE:MODE {WIRE1|WIRE2}, {1|2|3|4|5|6|7|8}   (*34923A/925A/933A only*)

Triggering Commands

*TRG

INITiate

READ? [(@*<ch_list>*)]

TRIGger:COUNt {*<count>*|MIN|MAX|DEF|INFinity}
TRIGger:COUNt? [{MIN|MAX}]

TRIGger:DELay {*<seconds>*|MIN|MAX}
TRIGger:DELay? [{MIN|MAX}]

TRIGger:DELay:AUTO {OFF|0|ON|1}
TRIGger:DELay:AUTO?

TRIGger:SOURce {IMMediate|BUS|EXTernal|TIMer}
TRIGger:SOURce?

TRIGger:TIMer {*<seconds>*|MIN|MAX|DEF}
TRIGger:TIMer? [{MIN|MAX}]

Measurement Statistics Commands

CALCulate:AVERage:AVERage? [(@<*ch_list*>)]

CALCulate:AVERage:CLEar [(@<*ch_list*>)]

CALCulate:AVERage:COUNt? [(@<*ch_list*>)]

CALCulate:AVERage:MAXimum? [(@<*ch_list*>)]

CALCulate:AVERage:MAXimum:TIME? [(@<*ch_list*>)]

CALCulate:AVERage:MINimum? [(@<*ch_list*>)]

CALCulate:AVERage:MINimum:TIME? [(@<*ch_list*>)]

CALCulate:AVERage:PTPeak? [(@<*ch_list*>)]

DATA:LAST? [,(@<*channel*>)]

Reading Memory Commands

DATA:POINts:EVENt:THReshold <*num_readings*>
DATA:POINts:EVENt:THReshold?

DATA:POINts?

DATA:REMove? <*num_readings*>

FETCh?

R? [<*max_count*>]

SYSTem:TIME:SCAN?

Mx+B Scaling Commands

CALCulate:SCALe:GAIN <*gain*> [, (@<*ch_list*>)]
CALCulate:SCALe:GAIN? (@<*ch_list*>)

CALCulate:SCALe:OFFSet <*offset*> [, (@<*ch_list*>)]
CALCulate:SCALe:OFFSet? (@<*ch_list*>)

CALCulate:SCALe:STATe {OFF|0|ON|1} [, (@<*ch_list*>)]
CALCulate:SCALe:STATe? [(@<*ch_list*>)]

CALCulate:SCALe:UNIT "<*units*>" [, (@<*ch_list*>)]
CALCulate:SCALe:UNIT? [(@<*ch_list*>)]

Calibration Commands

CALibration?

CALibration:ABORt

CALibration:BEGin[:VOLTage] [<setup_#>,] (@<channel>)

CALibration:COUNt? [{1-8|SLOT1-SLOT8|MAINframe|DMM}]

CALibration:LFRequency {50|60|400}
CALibration:LFRequency?

CALibration:MODule? [{1-8|SLOT1-SLOT8|ALL}]

CALibration:POINt? <value>

CALibration:SECure:CODE <new_code>

CALibration:SECure:STATe {OFF|0|ON|1}, <code>
CALibration:SECure:STATe?

CALibration:STRing "<string>" [,{1-8|SLOT1-SLOT8|MAINframe|DMM}]
CALibration:STRing? [{1-8|SLOT1-SLOT8|MAINframe|DMM}]

CALibration:VALue <value>
CALibration:VALue?

State Storage Commands

*RCL {1|2|3|4|5}

*SAV {1|2|3|4|5}

MEMory:NSTates?

MEMory:STATe:CATalog?

MEMory:STATe:DELete {1|2|3|4|5}

MEMory:STATe:DELete:ALL

MEMory:STATe:NAME {1|2|3|4|5} [,<name>]
MEMory:STATe:NAME? {1|2|3|4|5}

MEMory:STATe:RECall:AUTO {OFF|0|ON|1}
MEMory:STATe:RECall:AUTO?

MEMory:STATe:RECall:SELect {1|2|3|4|5}
MEMory:STATe:RECall:SELect?

MEMory:STATe:VALid? {1|2|3|4|5}

IEEE-488 Commands

*CLS

*ESE <enable_value>
*ESE?

*ESR?

*IDN?

*OPC

*OPC?

*RCL {1|2|3|4|5}

*RST

*SAV {1|2|3|4|5}

*SRE <enable_value>
*SRE?

*STB?

*TRG

*TST?

*WAI

System-Related Commands

*IDN?

*RST

*TST?

CALibration:LFRequency {50|60|400}
CALibration:LFRequency?

DISPlay[:STATe] {OFF|0|ON|1}
DISPlay[:STATe]?

DISPlay:TEXT "<string>"
DISPlay:TEXT?

DISPlay:TEXT:CLEar

SYSTem:ABUS:INTerlock:SIMulate {OFF|0|ON|1}
SYSTem:ABUS:INTerlock:SIMulate?

SYSTem:BEEPer

SYSTem:CDEScription? {1|2|3|4|5|6|7|8}

SYSTem:CPON {1|2|3|4|5|6|7|8}

SYSTem:CTYPe? {1|2|3|4|5|6|7|8}

SYSTem:DATE <yyyy>,<mm>,<dd>
SYSTem:DATE?

SYSTem:ERRor?

SYSTem:PRESet

SYSTem:SECurity:IMMediate

SYSTem:TIME <*hh*>,<*mm*>,<*ss.sss*>
SYSTem:TIME?

SYSTem:TIME:SCAN?

SYSTem:VERSion?

Remote Interface Configuration Commands

SYSTem:COMMunicate:ENABle {OFF|0|ON|1}, {GPIB|USB|LAN|SOCKets|TELNet|VXI11|WEB}
SYSTem:COMMunicate:ENABle? {GPIB|USB|LAN|SOCKets|TELNet|VXI11|WEB}

SYSTem:COMMunicate:GPIB:ADDRess <*address*>
SYSTem:COMMunicate:GPIB:ADDRess?

SYSTem:LOCK:OWNer?

SYSTem:LOCK:RELease

SYSTem:LOCK:REQuest?

LAN Configuration Commands

SYSTem:COMMunicate:LAN:AUTOip {OFF|0|ON|1}
SYSTem:COMMunicate:LAN:AUTOip?

SYSTem:COMMunicate:LAN:BSTatus?

SYSTem:COMMunicate:LAN:CONTrol?

SYSTem:COMMunicate:LAN:DHCP {OFF|0|ON|1}
SYSTem:COMMunicate:LAN:DHCP?

SYSTem:COMMunicate:LAN:DNS <*address*>
SYSTem:COMMunicate:LAN:DNS?

SYSTem:COMMunicate:LAN:DOMain "<*name*>"
SYSTem:COMMunicate:LAN:DOMain? [{CURRent|STATic}]

SYSTem:COMMunicate:LAN:GATEway <*address*>
SYSTem:COMMunicate:LAN:GATEway? [{CURRent|STATic}]

SYSTem:COMMunicate:LAN:HISTory:CLEar

SYSTem:COMMunicate:LAN:HISTory?

SYSTem:COMMunicate:LAN:HOSTname "<*name*>"
SYSTem:COMMunicate:LAN:HOSTname? [{CURRent|STATic}]

SYSTem:COMMunicate:LAN:IPADdress <*address*>
SYSTem:COMMunicate:LAN:IPADdress? [{CURRent|STATic}]

SYSTem:COMMunicate:LAN:KEEPalive {<*seconds*>|MIN|MAX}
SYSTem:COMMunicate:LAN:KEEPalive? [{MIN|MAX}]

SYSTem:COMMunicate:LAN:MAC?

SYSTem:COMMunicate:LAN:SMASk *<mask>*
SYSTem:COMMunicate:LAN:SMASk? [{CURRent|STATic}]

SYSTem:COMMunicate:LAN:TELNet:PROMpt "*<string>*"
SYSTem:COMMunicate:LAN:TELNet:PROMpt?

SYSTem:COMMunicate:LAN:TELNet:WMESsage "*<string>*"
SYSTem:COMMunicate:LAN:TELNet:WMESsage?

Status System Commands

*CLS

*ESE *<enable_value>*
*ESE?

*ESR?

*SRE *<enable_value>*
*SRE?

*STB?

STATus:ALARm:CONDition?

STATus:ALARm:ENABle *<enable_value>*
STATus:ALARm:ENABle?

STATus:ALARm[:EVENt]?

STATus:MODule:ENABle *<enable_value>*
STATus:MODule:ENABle?

STATus:MODule:EVENt?

STATus:MODule:SLOT[*n*]:CONDition?
STATus:MODule:SLOT[*n*]:ENABle *<enable_value>*

STATus:MODule:SLOT[*n*]:ENABle?

STATus:MODule:SLOT[*n*][:EVENt]?

STATus:OPERation:CONDition?

STATus:OPERation:ENABle *<enable_value>*
STATus:OPERation:ENABle?

STATus:OPERation[:EVENt]?

STATus:PRESet

STATus:QUEStionable:CONDition?

STATus:QUEStionable:ENABle *<enable_value>*
STATus:QUEStionable:ENABle?

STATus:QUEStionable[:EVENt]?

SYSTem:MODule?

Service-Related Commands

DIAGnostic:DMM:CYCLes? {1|2|3|4|5|6}

DIAGnostic:RELay:CYCLes? (@<ch_list>)

DIAGnostic:RELay:CYCLes:CLEar (@<ch_list>)

INSTrument:DMM:CONNect
INSTrument:DMM:CONNect?

INSTrument:DMM:DISConnect
INSTrument:DMM:DISConnect?

INSTrument:DMM:INSTalled?

INSTrument:DMM[:STATe] {OFF|0|ON|1}
INSTrument:DMM[:STATe]?