YOUR DISCRETE TEST SOURCE
SCIENTIFIC TEST, INC.

CURVE TRACER SERIES 5000
SEMICONDUCTOR TESTER

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CURVE TRACER SERIES 5000

FUNCTION

The Curve Tracer Series 5000 provides all of the functions of the 5000E and 5300HX with the ability to create digital curves for storage and intuitive manipulation.

Curves are generated using high speed ATE test steps to build the curve point by point. Precision data points are generated quickly and accurately using an STI 5000C or 5300C Test System. Data increments are programmable in linear or logarithmic steps. Curves are generated rapidly. Typical test time per step is 6 to 20MS. A two hundred data point curve will typically take only a few seconds to generate. Captured curve data points can be loaded into Excel® to create curve trace presentations.

- PC Based
- Wide Selection of Available Curves
- Programmable Data Point Increments
- Increments can be Linear or Logarithmic
- Programmable Off-Time to Minimize Heating
- Save and Recall Curve Entry Programs
- Save and Recall Previously Captured Curve Image
- Load Curve Data Directly to Excel
- Run up to 10 Curve Programs in Sequence with data loaded to Excel Automatically
- Program Maximum Current/Voltage Limits to Prevent Damage or Heating
- Store/Recall Test Programs
- Multiple Sequential Curves
- Multiple Devices
- Current Limit in Test Program
- Logarithmic Curves
- Easy to Use
  - Select Curve
  - Enter Range
  - Press Start
- Full Range of Current (not limited to 20A)
- Graph Features - Tools
  - Scales Axes
  - Change Log/Linear
  - View Data Points on Curve
  - Zoom
  - Print Graph
  - Set cursors for new sweep
  - Save Graph
- No Patch Cords
- No SMU Set-Up-Selection; Completely Automatic

Optional tests can be created for connection to external test equipment.
For Curve Tracer specifications refer to Discrete Semiconductor Tester 5000E & 5300HX brochure.

Windows® is a registered trademark of Microsoft Corporation. Excel® is a registered trademark or trademark of Microsoft Corporation.

PROGRAMMING

Programming a curve is simple and straightforward. Select desired curve on the menu and fill in the blanks.

Model 5300C

RANGES

VOLTAGE

- 1KV Standard, 2KV Optional
- .20V Gate/Base; 80V Optional

CURRENT

- 2NA to 50A, 100A Optional
- Optional: 20PA Lo Deck

OPTIONAL

- 100/500/1000/1200A Hi Deck

RESOLUTION

- 1MV
- 0.1NA, Optional 1PA Lo Deck
- 0.01 Milliohm RDSON

PERFORMANCE

The Series 5000 Curve Tracer provides quick creation of digital curves for storage and intuitive manipulation. Curves are generated using a high speed ATE system.

Model 5000C

LabView® is a registered trademark or trademark of National Instruments.

STANDARD CURVES

Additional curves can be added using any test available. These include but are not limited to transistor, triac, SCR, MOSFET, IGBT, OVP, gated device, diode, zener, opto-coupler, regulator, MOV, J-FET, opto-switch, diac, opto-logic, Quadrac®, sidac, STS, SBS, and relay.

CURVE TRACER CURVES AVAILABLE

MOSFET N-Channel
- ID vs. VDS (at range of VGS)
- ID vs. VGS (at range of VDS)
- IS vs. VSD
- RDSON vs. VGS (at fixed ID)
- RDSON vs. ID (at several VGS)
- IDSS vs. VDS (Reverse Bias Selectable)
- VGSTH vs. ID

MOSFET P-Channel
- ID vs. VDS (at range of VGS)
- ID vs. VGS (at range of VDS)
- IS vs. VSD
- RDSON vs. VGS (at fixed ID)
- RDSON vs. ID (at range of VGS)
- IDSS vs. VDS (Reverse Bias Selectable)
- VGSTH vs. ID

Transistor NPN
- HFE vs. IC
- BVCE (O, S, R, V) vs. IC
- BVEBO vs. IE
- ICBO vs. VCBO
- VCE (SAT) vs. IC (at fixed IC/IB ratio)
- VCE (SAT) vs. IB (at range of IC)
- VBE (SAT) vs. IC (at fixed VCE)
- IC vs. VCE (at range of IB) (Curve Tracer Only)
- IEBO vs. VEB
- ICEO vs. VCE

Transistor PNP
- HFE vs. IC
- BVCE (O, S, R, V) vs. IC
- BVEBO vs. IE
- ICBO vs. VCBO
- VCE (SAT) vs. IC (at fixed IC/IB ratio)
- VCE (SAT) vs. IB (at range of IC)
- VBE (SAT) vs. IB (at fixed IC/IB ratio)
- VBE (ON) vs. IC (at fixed VCE)
- IC vs. VCE (at range of IB) (Curve Tracer only)
- IEBO vs. VEB
- ICEO vs. VCE

IGBT N-Channel
- IC vs. VCE (at range of VGE)
- IC vs. VGE (at range of VCE)
- ICES vs. VCE
- IF vs. VF
- VCE vs. VGE

IGBT P-Channel
- IC vs. VCE (at range of VGE)
- IC vs. VGE (at range of VCE)
- ICES vs. VCE
- IF vs. VF
- VCE vs. VGE

Diode
- IF vs. VF
- IR vs. VR

Zener
- IF vs. VF
- IZ vs. BVZ

Triac
- IT vs. VT+ (at fixed IG and RGK open)
- IT vs. VT- (at fixed IG and RGK open)

SCR
- IT vs. VTM (at fixed IG and RGK open)

SSOVP
- IT vs. VT+ (at fixed IBO)
- IT vs. VT- (at fixed IBO)

SIDAC
- IT vs. VT+ (at fixed IBO)
- IT vs. VT- (at fixed IBO)

DIAC
- ID vs. VF+
- ID vs. VF-

Regulator Positive
- Electronic Load vs. VOUT (at fixed IMAX)

Regulator Negative
- Electronic Load vs. VOUT (at fixed IMAX)

JFET N-Channel
- ID (OFF) vs. VDS (at range of VGS)
- ID (OFF) vs. VGS (Reverse Bias) (at fixed VDS)
- ID (ON) vs. VDS (at range of VGS)
- ID (ON) vs. VGS (Reverse Bias) (at fixed VDS)

JFET P-Channel
- ID (OFF) vs. VDS (at range of VGS)
- ID (OFF) vs. VGS (Reverse Bias) (at fixed VDS)
- ID (ON) vs. VDS (at range of VGS)
- ID (ON) vs. VGS (Reverse Bias) (at fixed VDS)

Other Curves
- V vs. I Quadrants I and III

PROGRAMMING

Programming the data points on the curve tracer is simple and direct. Fig. 1 shows an IDON vs VDS program screen for an N-Channel MOSFET. The maximum limit for the measured variable, IDON, is the top line entry. When the maximum limit is reached, data capture terminates and the curve is complete. The horizontal axis is VDS and is programmable in increments. Two different increment sizes can be programmed. This allows the user to program finer data points in the area of interest in the curve. In the example shown, the first increment size is 400 MV; the second increment size is 4V. The increment size changes at VDS of 4V. VDS range is programmed from 10MV to 40V. VGS data points can be programmed similarly. The curve is run by sweeping the VDS data points at each VGS bias voltage and continues until the maximum ID is obtained at each VGS or until all data points have been reported.

Additional tabs provide user selectable features. Tabs can be selected by clicking on a function near the top of the Curve Tracer screen: Load/ Save for recall and saving programs, Sweep Type to select linear or logarithmic axes where appropriate, Ext. Relays to set relay drivers to connect external components, ADP-401A to set pin connections when the curve tracer is used with an ADP-401A 8 or 16 pin programmable scanner, and Misc. Controls to load a completed curve and data points directly to Excel with the graph automatically included. The data points can also be graphed in other formats provided by Excel.

A number of graphing features are also included. The mouse can be used to zoom in on a specific area of the curve. Cursors can be moved on a completed curve to re-set start and stop limits to re-generate the curve in greater detail in an area of interest. Clicking on an axis will change the scale from linear to logarithmic. Clicking on a curve will show all data points on the curve.

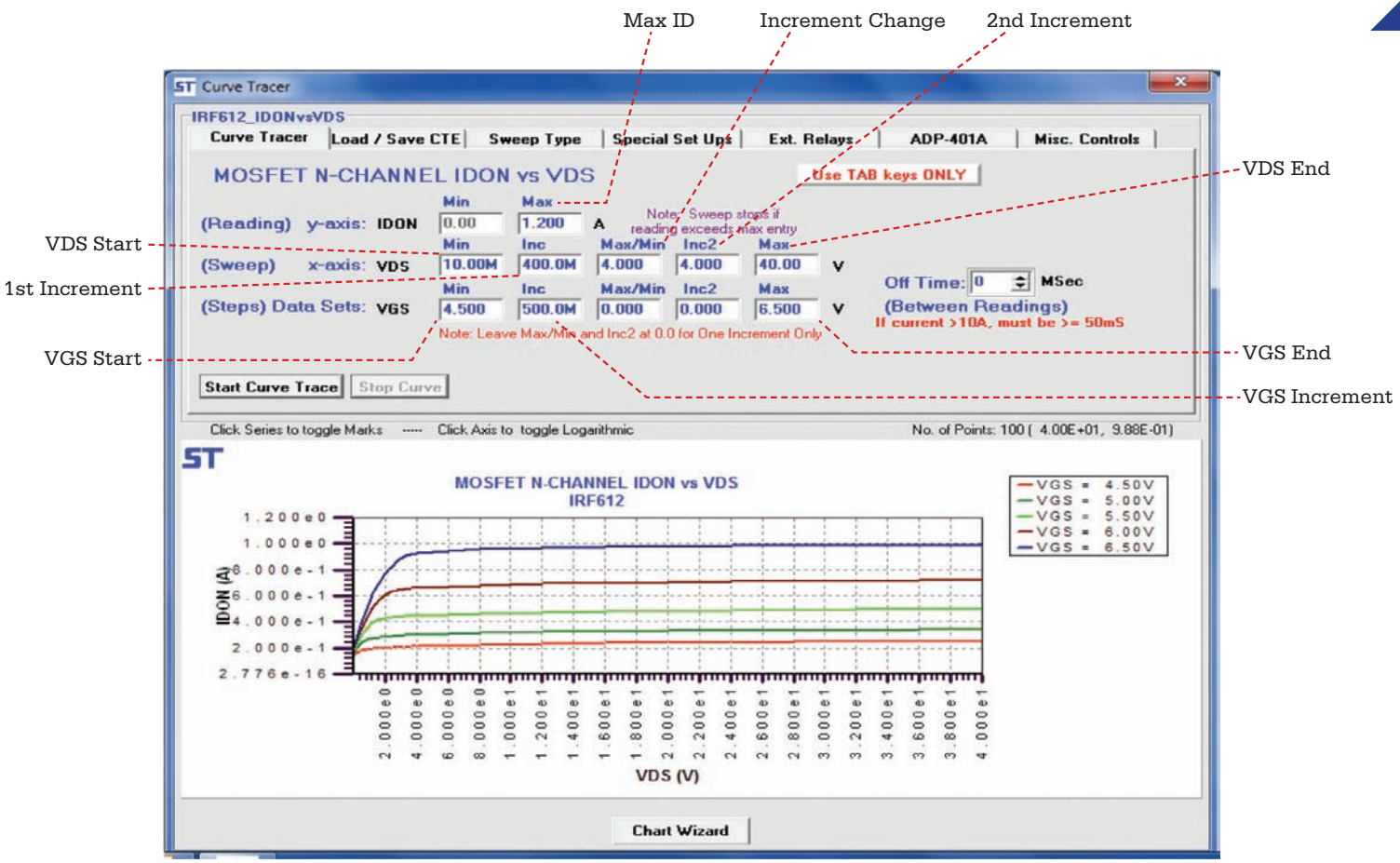
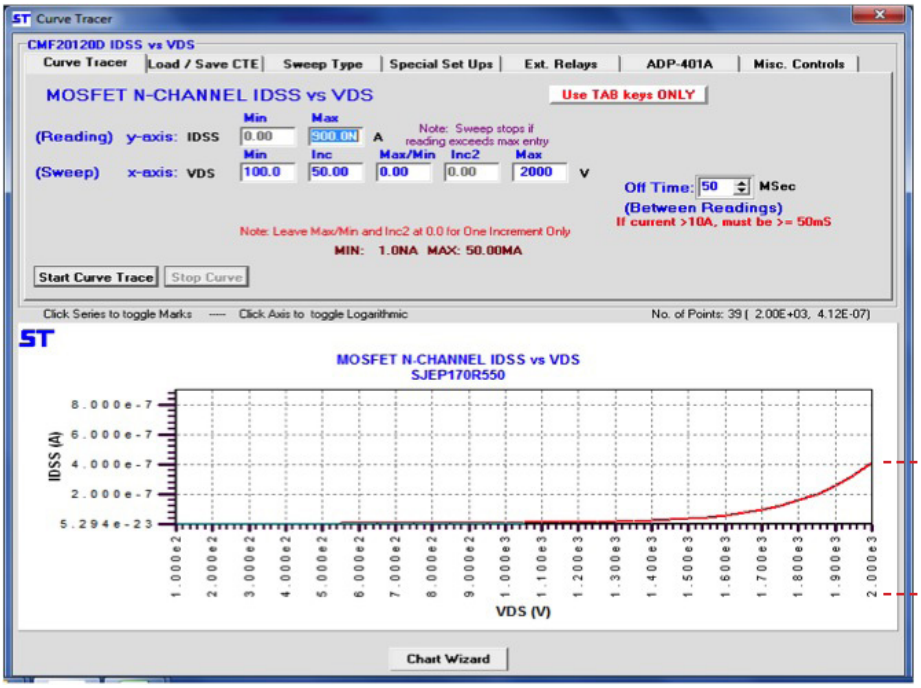


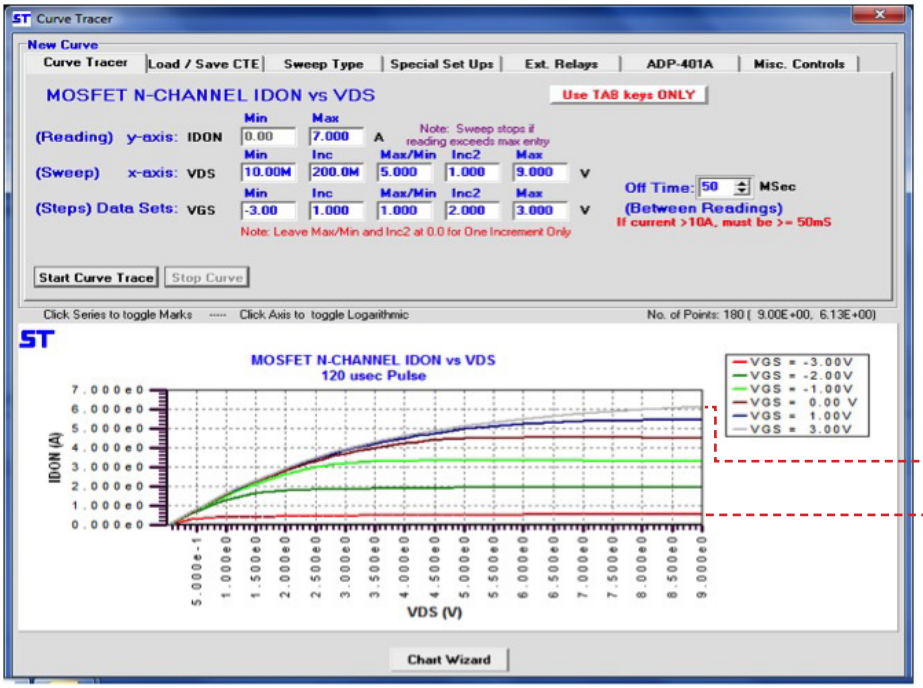
Figure 1

Other curves are similarly programmed. See examples that follow in Figures 2 thru 9.

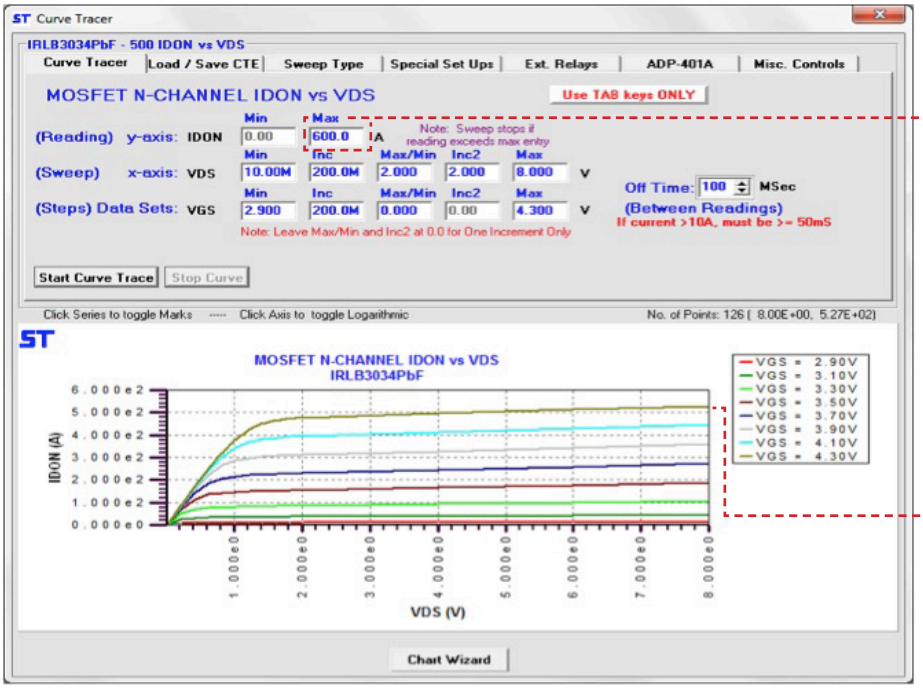
EXAMPLES



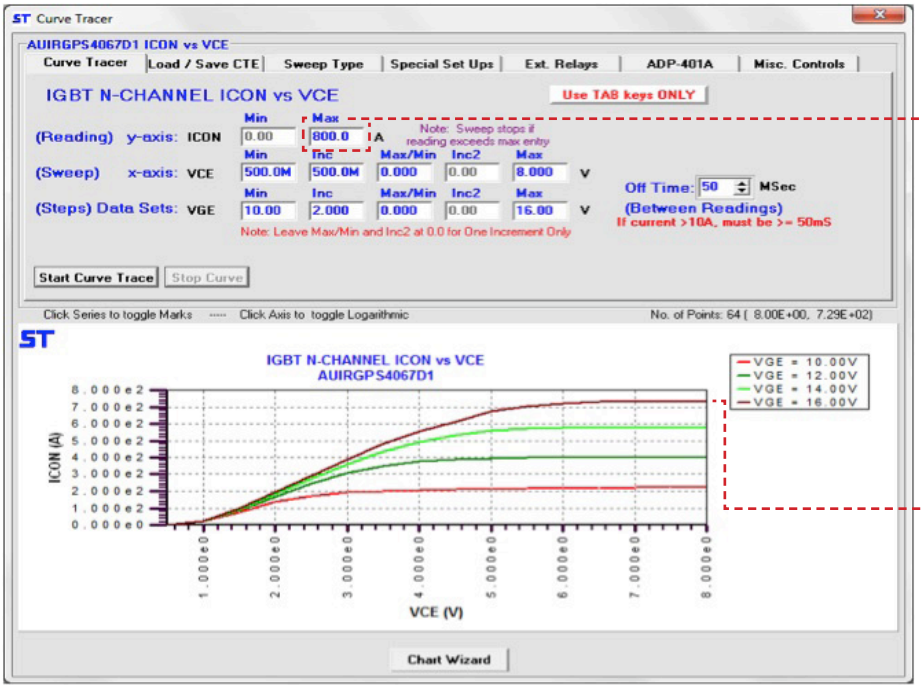
SiC IDSS vs VDS (Figure 2)



GaN FET, Bipolar Gate, IDON vs VDS (Figure 3)

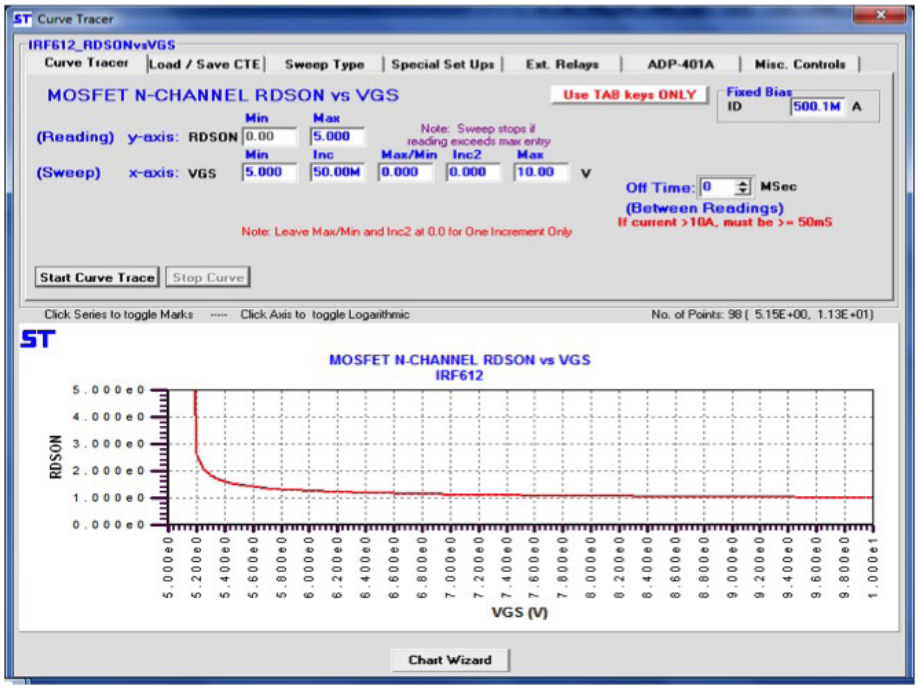


HI Current MOSFET, ID vs VDS (Figure 4)

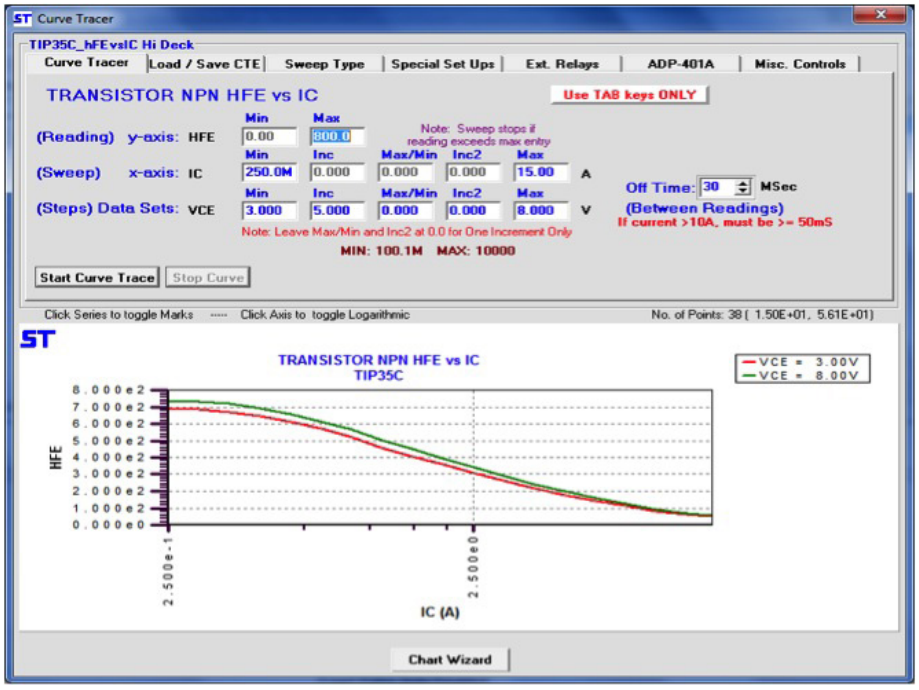


HI Current IGBT, IC vs VCE (Figure 5)

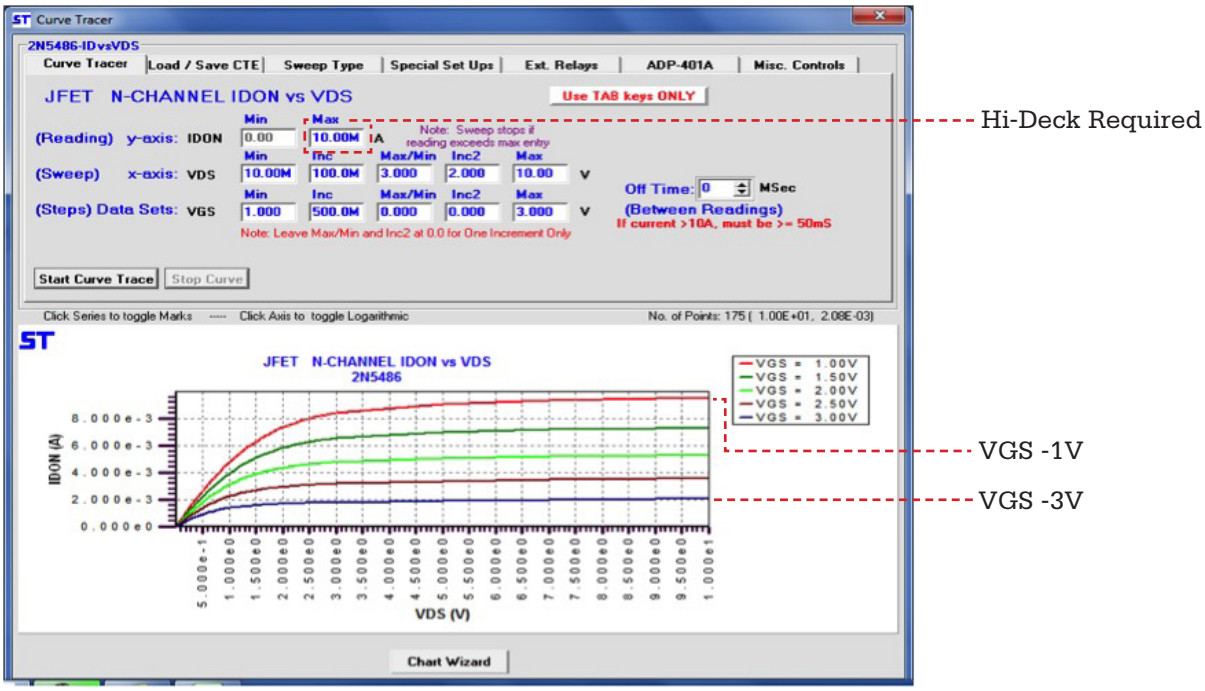
EXAMPLES



NMOS RDSON vs VGS (Figure 6)



NPN hFE vs IC (Figure 7)



N JFET, IDON vs VDS (Figure 8)

NPN IC vs VCE (Figure 9)

CURVE SUITE

A suite of curves can be generated using a group of previously saved curve programs. The curves are run in sequence automatically without the intervention of an operator other than to start the curve sequence. See Figures 10 thru 15. Individual graphs are displayed on the screen as the curves are generated; curve data points are automatically loaded into Excel along with the captured graph. Graphs can be viewed in order by clicking the “View Next” button.

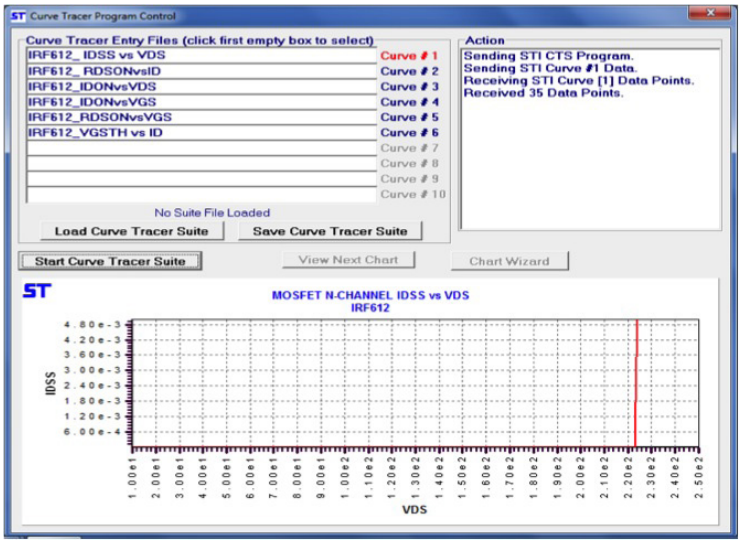


Figure 10

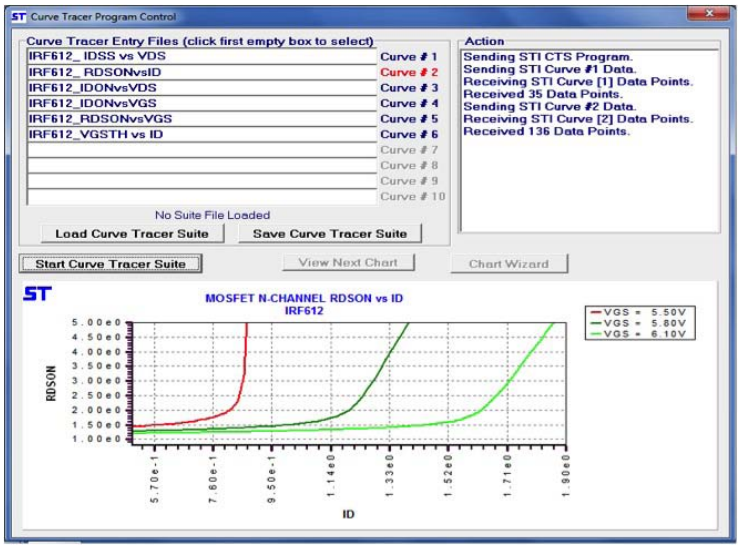


Figure 11

Figure 12

Figure 13

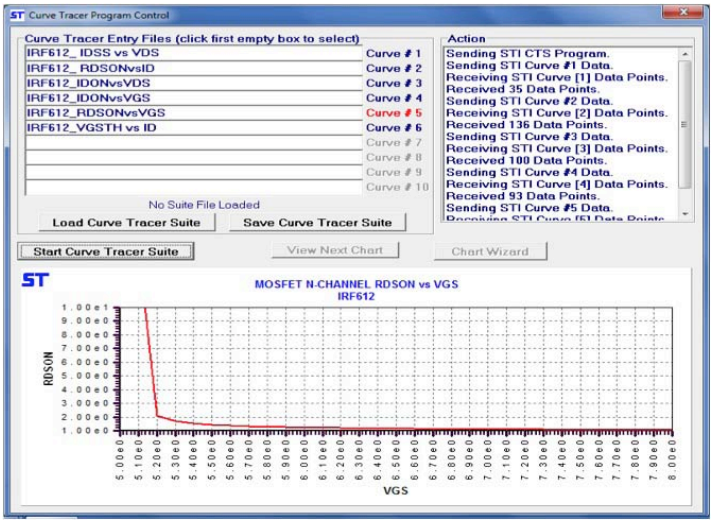


Figure 14

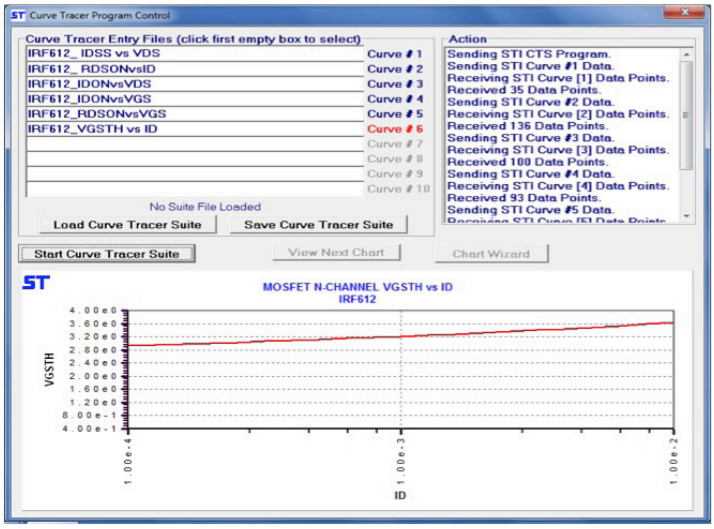
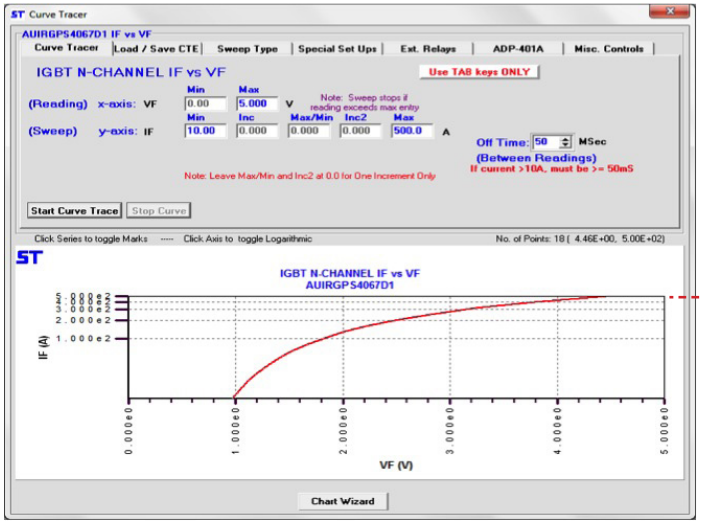


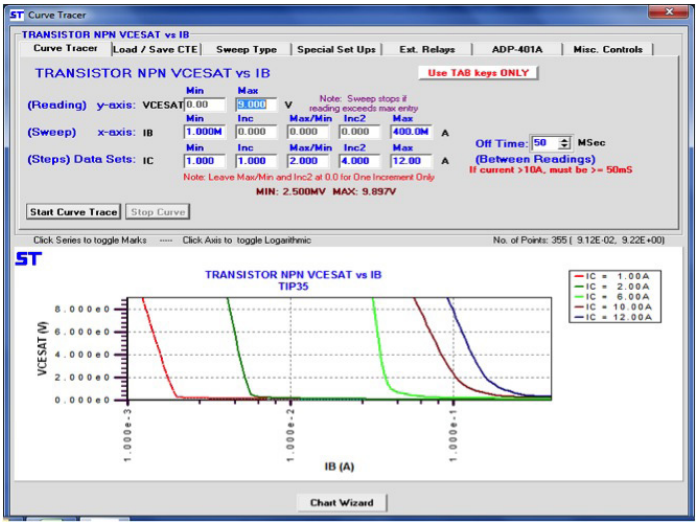
Figure 15

CURVE EXAMPLES

500A

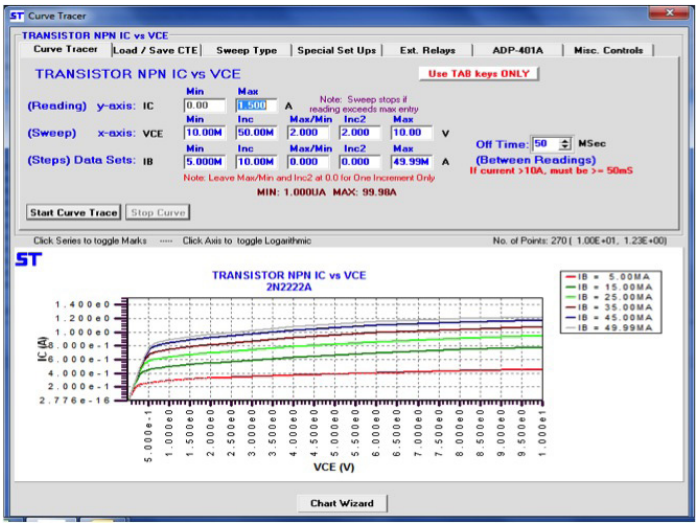


IGBT Diode IF vs VF

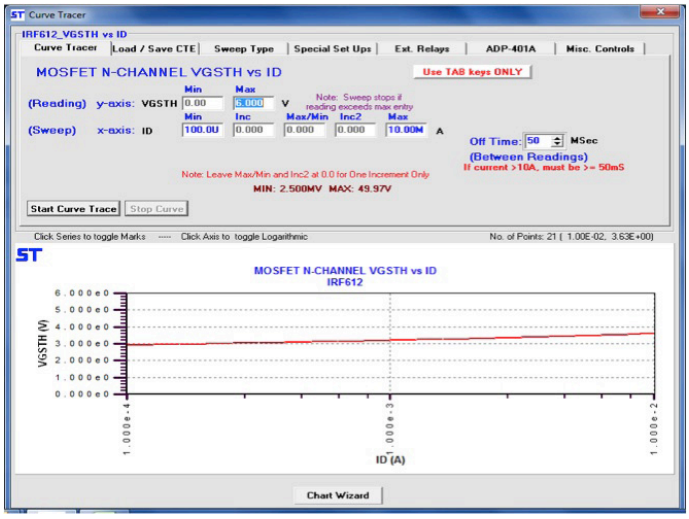


NPN VCE vs IB

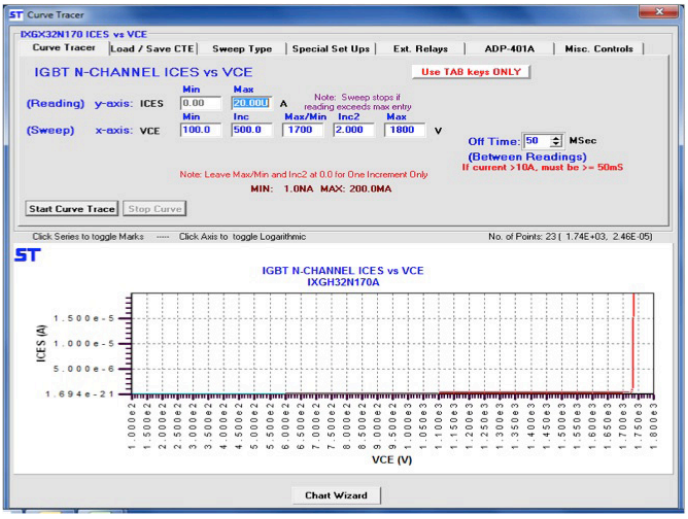
IGBT IC vs VCE, 100A Option



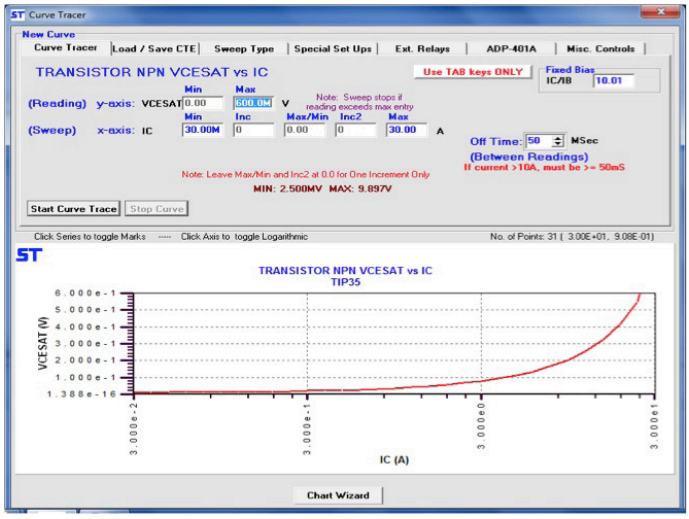
NPN IC vs VCE



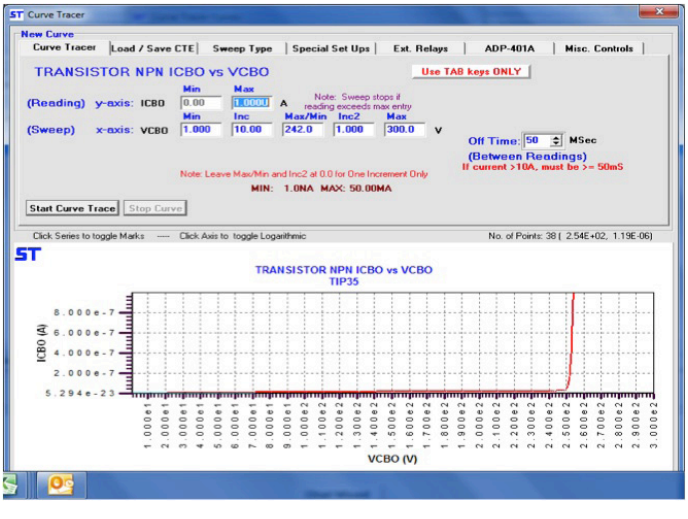
VGSTH vs ID



IGBT ICES vs VCE

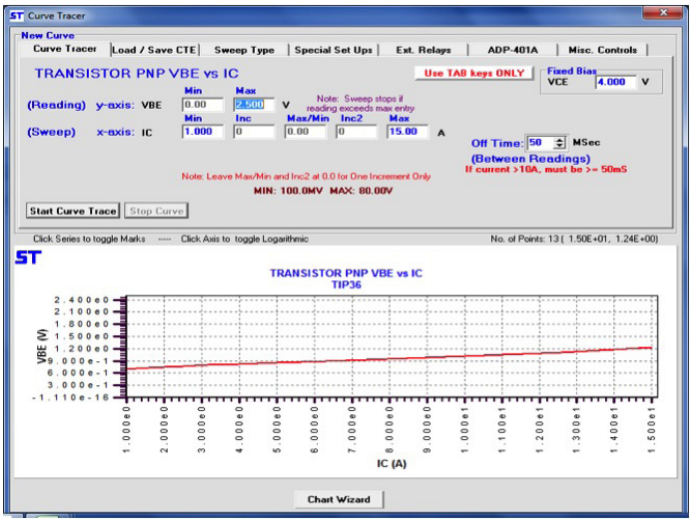


NPN VCESAT vs IC, IC/IB Fixed Ratio

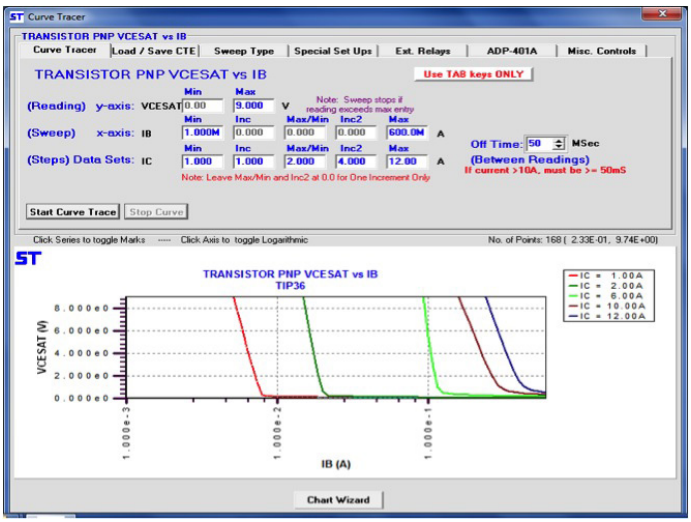


NPN ICBO vs VCB

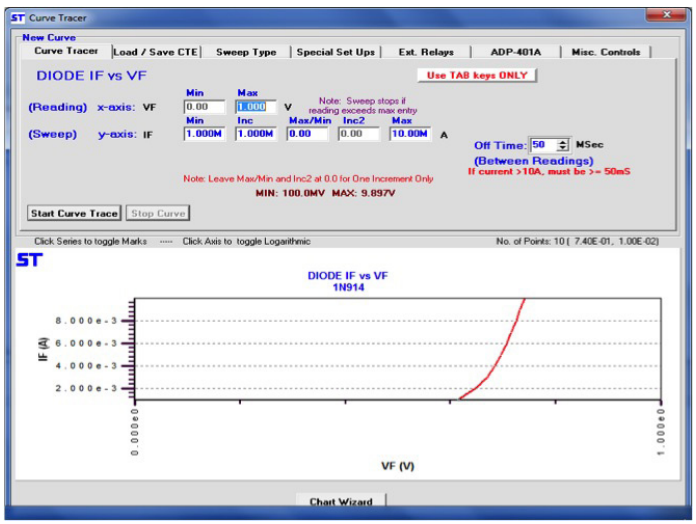
CURVE EXAMPLES



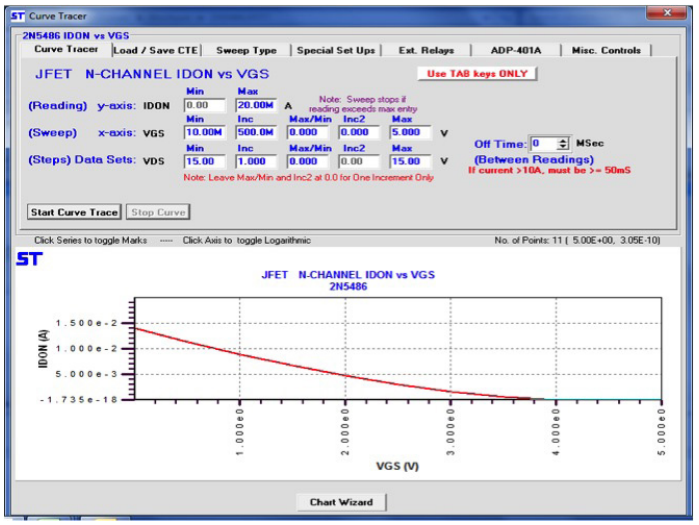
PNP VBE vs IC, fixed VCE



PNP VCE vs IB



Diode IF vs VF



JFET IDON vs VGS

WEIGHT AND DIMENSIONS

MODEL	DIMENSIONS (mm)	WEIGHT (kg)	POWER
MODEL 5000 SERIES Tester Mainframe	17" (432) x 20" (508) x 10.5" (267)	55 lbs (25)	120/240 VAC (+5%, -15%) 50/61 Hz, Fused 2A/1A
MODEL LC-1000 Lo Current Deck	16.5" (419) x 10.5" (267) x 8" (203)	11 lbs (5)	Powered from 5000 Series Tester
MODEL HC-500 Hi Current Deck	17" (432) x 20" (508) x 10.5" (267)	35 lbs (15.9)	Powered from 5000 Series Tester

RACK MOUNT AVAILABLE

SELECTING A TESTER

QUESTIONS TO ASK

- Is programming easy? Will vendor give you software to evaluate?
- Are current and voltage ranges sufficient?
- Can current/voltage ranges be extended later?
- Are a wide selection of fixtures available?
- Is test/datalog speed adequate?
- Will vendor benchmark your samples for speed and correlation?
- Is the test method "single measure"?
- Does it include self-test with convenient troubleshooting guide?
- Is auto-calibrate included?
- Is vendor experienced? How many systems have they installed?
- Is tester limited to single device type/family? (latent cost)
- Is curve trace available?

TEST SPECIFICATIONS

SCIENTIFIC TEST, INC. TEST SPECIFICATIONS 5000C/5300C

	TEST		SPECIFICATION		
	PARAMETER	V RANGE	I RANGE	MAX RES.	ACCURACY
LEAKAGE	I_R, I_{CBO}, $I_{CEO/R/S/X}$, $I_{DSS/X}$, I_{DOFF}, I_{DRM}, I_{RRM}	.10V to 999V (2000V)[1]	2NA (20PA)[2] to 50MA	1 NA (1PA)[2]	1% + 2NA + 20PA/V[8] (1% + 200PA + 2PA/V)[2,8]
	I_{EBO}, I_{GSSF}, I_{GSSR}, I_{GSS}, I_{GKO}, I_R (OPTO)	.10V to 20V (80V)[3]	2NA (20PA)[2] to 3A	1 NA (1PA)[2]	1% + 2NA + 20PA/V[8] (1% + 200PA + 2PA/V)[2,8]
BREAKDOWN	BV_{CEO}, BV_{CES} (IGBT) (300µS Pulse above 10mA)	.10V to to 450V (900V)[1] to 700V (1400V)[1] to 800V (1600V)[1]	100µA to 200MA to 100MA to 50MA	1 MV	1% + 100MV
	BV_{DSS}, V_D, BV_{CBO}, V_{DRM}, V_{RRM}, V_{BB}, BV_R	.10V to 999V (2000V)[1]	100NA to 50MA	1 MV	1% + 100MV
	BV_Z	.10V to 5.00V to 9.999V to 50.00V to 700V (1400V)[1] to 999V (2000V)[1] BVZ Soak - 50V (100V) 0-50 ms to 99 secs	10µA to 49.9A (500A)[4, 10] to 25A (250A)[4, 10] to 9.99A to 100 MA to 50MA to 400mA to 80mA	1 MV	0.4% + 2 LSB
	BV_{EBO}, BV_{GSS}, BV_{GKO}	.10V to 20V (80V)[3]	100NA to 3A	1 MV	1% + 10MV
VCESUS	V_{CEOSUS}, V_{CERSUS}, V_{CEVSUS}	V_{CE}: TO 1500V Inductive Kickback, 35mH choke	I_C: to 4A	0.5V	2% + 0.5V
IMPEDANCE	ZZ (1 kHZ) 0.1Ω to 20 KΩ	0.1V to 200V DC (measure 50µV to 300mV rms)	100µA to 300mA DC	0.001 Ω 1µV	1% + 1% Range
GAIN	h_{FE} (1 to 99,999) CTR (.01 to 99,999) gFS, gFE	V_{CE}: .10V to 5.00V[5] to 9.99V to 49.9V VDS, ID: Same as ON STATE VGS: 0.1V to 20V (80V)[3]	I_E: 10µA to 49.9A (99.9A)[9] (500A)[4, 10] derate to 25A (50A)[9] (250)[4, 10] derate to 9.99A I_F, I_B: 100NA to 10A ΔID/ΔVGS automatically computed	.01 hFE .0001 CTR	V_{CE}: 1% + 10MV I_C: 1% + 100NA I_F, I_B: 1% +5NA

1. 2000V Hi Voltage (Anode/Collector) Option
2. Lo Current Deck Option — Also adds programmable soak time from 1 mS to 99 secs. for current under 1µA. (Not available on 5000E)
3. 80V Lo Source (Gate/Base) Option
4. 500 Amp Hi Current Deck Option. (Not available on 5000E)
5. Voltage @ front panel terminals; allow for drop in cables
6. Optional 100V Hi Source
7. 40A Lo Soure Option
8. Hi Deck or Adaptor: 1% + 2NA + 40PA/V
9. 100A Option
10. HC-1000 is (1000A) derate to (500A); HC-1200 is (1200A) derate to (600A).

	TEST		SPECIFICATION		
	PARAMETER	V RANGE	I RANGE	MAX RES.	ACCURACY
ON STATE	V_{CESAT}, V_{BESAT}, V_{BEON} V_F, V_T V_{DSON}, I_{DON}, V_{GSON} V_{GEON} V_F (Opto-Diode) RDSON	V_{CE}, V_D, V_F, V_T: .10V to 5.00V to 9.99V V_{GS}, V_{GE}, V_{BE}, V_F: .10V to 9.99V 1.00mΩ to 1KΩ	I_E, V_T, I_F, I_D: 10µA to 49.9A (99.9A)[9] (500A)[4, 10] derate to 25A (50A)[9] (250A)[4, 10] I_B, I_F, I_{GT}: 100NA to 10A (40A)[7] VDS, ID: Same as ON STATE VGS: 0.1V to 20V (80V)[3]	1MV .01mΩ	V: 1% + 10MV I_E, I_F, I_D, I_T: 1% + 100NA I_B, I_{GT}: 1% + 5NA
	V_{GSTH}, V_{GETH}	.10V to 49.9V	I_D: 100µA to 3A	1MV	1% + 10MV
	V_O (Regulator)	V_O: .10V to 20V (50V)[3] V_{IN}: .10V to 49.9V Load: Resistive or Electronic	I_O: 1MA to 5A	1MV	1% + 10MV
	I_{IN} (Regulator)	V_{IN}: .10V to 20V (80V)[3] Load: R_{GK}, 1K, 10K, EXT, OPEN, SHORT	I_{IN}: 1MA to 3A	10NA	1% + 5NA
	V_C	.10V to 49.9V	10MA to 10A	1MV	1% + 10MV
OFF	V_{GSOFF}	V_O: .10V to 20V (80V)[3]	I_D: 100NA (20PA)[2] to 3A V_{DS}: .10V to 50V	1MV	1% + 10MV
TRIGGER	I_{GT} V_{GT} V_{OPER} (Relay)	V_D: 5V to 49.9V V_{GT}: .10V to 20V (80V)3 .10V to 50V	I_{AK}: to 3A I_{GT}: 100NA to 3A R_L: 12, 30, 100Ω, EXT	10NA 1MV .10V	1% + 5NA 1% + 10MV 1% + .10V
HOLD	I_H $V_{RELEASE}$ (Relay)	V_D: 5V to 49.9V .10V to 50V	I_H: 1.5A I_{GT}: 100NA to 3A R_L: 12, 30, 100Ω, EXT (Initial I_{AK} set by R_L)	1µA .10V	1% + 2µA 1% + .10V
LATCH	I_L (Tested indirectly, no exact value)	V_D: 5V to 49.9V	I_L: 100µA to 3A I_{GT}: 100NA to 3A R_L: 12, 30, 100Ω, EXT	N/A	N/A
BREAKOVER	V_{BO}, I_{BO} (SSOVP) V_{BO}, I_{BO} (STS, DIAC) V_{BO}, I_{BO} (SIDAC) V_S, I_S (SBS, STS)	0.10 to 400V[1] 0.10 to 20V (80V)[3] 0.10 to 400V[1] 0.10 to 20V (80V)[3]	10mA to 900mA 1µA to 200µA 1µA to 1mA 1µA to 200µA	1mV	1% + 100mV 1% + 10mV 1% + 100mV

Accuracy specifications are in addition to ± 1 digit in readout.

PRODUCT LIST

5000 SERIES SYSTEMS

PART NUMBER	DESCRIPTION
5000C	Curve Tracer 2NA to 50A, 20v, 1Kv
5000E	Discrete Semiconductor Tester 2NA to 50A, 20v, 1Kv
5300C	Curve Tracer 2NA to 50A, 20v, 1Kv (extended ranges available)
5300HX	Discrete Semiconductor Tester 2NA to 50A, 20v, 1Kv (extended ranges available)

(All 5000 Series Testers include 1 TO-220 GAK fixture, may be substituted for a different fixture at customer request.)
RACK MOUNT AVAILABLE

HIGH VOLTAGE OPTIONS FOR ABOVE

HVA-2000	2000 Volt Anode/Collector Option (Factory Installation Required)
HVG-80	80V Gate/Base Option, Recommended for High Gate Voltage MOSFETs. (Factory Installation Required)
AUX-150	Auxiliary 150V Power Supply for Impulse Reset Test and 10x1000 µS

HIGH CURRENT OPTIONS FOR ABOVE

HC-100	100 Amp Mainframe
HC-1.5/400	1.5 Amp High Current Option (@400V for IBO)
LO-40	Extends Low Source to 40A (80V Gate ONLY)

5300C AND 5300HX ONLY OPTIONS

LC-1000	Low Current Deck (20PA/1PA Resolution) Adds soak to 99 seconds for current less than 1uA
HC-500	500 Amp High Current Deck
HC-1000	1000 Amp High Current Deck
HC-1200	1200 Amp High Current Deck, 10V@1200A, at the terminals
ADP-340-4	Transient Surge 5 Pin Module Test Station
ADP-340-5	Transient Surge 5 Pin Module (or SSOVP) Test Station with Tip-Com, Ring-Com, Tip-Ring, includes 100V/us test. (VBO, IBO, IH, VT, RCOIL, VL, VB, VZ, and ID) (Requires HVA-2000)

PART NUMBER	DESCRIPTION
5300C AND 5300HX ONLY OPTIONS	
ADP-340-5G	Same as ADP-340-5 plus Gated Device Option (IGT, VGT, VF, ID, VBO, IBO, IH, VT, IR, IG) (Requires HVA-2000)
ADP-SURG	Adds 10x1000 µS 10A test to ADP-340
ADP-410	Inductive Sustaining Test Adaptor (VCEOSUS, VCERSUS, VCESUS, ICEV) to 4A, 1600V
SCANNER OPTIONS FOR ALL SYSTEMS (SCANNERS REQUIRE A HANDLER BOARD & CABLE OR PERSONALITY FIXTURE)	
ADP-401A-8	Scanner for 8 pins Totally Programmable, 30A, 1200V
ADP-401A-16	Scanner for 16 pins Totally Programmable, 30A, 1200V
SOFTWARE OPTIONS FOR ALL SYSTEMS	
SW-MAP	Wafer Mapping Option (Includes Software/Firmware) Map of Bin, Sort or Test Result Requires X-Y Coordinates from Prober via RS-232
SW-HIREL	Hi Rel Software Option (Delta percent testing including on-line delta testing with re-test capability)
SW-CURVE	Auto Generate Curve Trace (Add Curve Trace to any system, included with a 5000C)
THRML-VBE	Delta VBE for Thermal Transistor Test; Programmable to 10A, 50V, 50MS; requires hardware
DUAL-VBE	Differential VBE Matching; requires scanner/hardware
DEVICE ADAPTORS	
ADP-310	Opto-Coupler Adaptor, (Requires Opto Test Fixture) (See Opto Test Fixtures)
ADP-320	Regulator (3 terminal) Adaptor, (Requires a Test Fixture) (See Test Fixtures)
ADP-350	Quadrac/Diac Test Adaptor, (Requires a Test Fixture) (HVG-80 recommended)
ADP-360	Adaptor to Test: 1.Transient Surge devices (SSOVP) 2.Sidacs 3.Diacs (Requires HVA-2000)
ADP-370	8 pin Dip Opto Logic Device Adaptor
ADP-380	Kelvin Adaptor (Accepts standard test fixtures)
ADP-390	Relay Test Adaptor (RCOIL, VOPER, VREL, RCONT, OPTIME, RELTIME)
ADP-506	I Latch Load Box for Exact Latching Measurements
ADP-508	Adaptor for 5 Lead Device with Current Sense to 10MA and Kelvin Pins, also Called HEX Sense
ADP-ICEV	Banana Plug Resistor Cap

PRODUCT LIST continued...

5000 SERIES SYSTEMS

PART NUMBER	DESCRIPTION
TEST FIXTURES - SELF-TEST	
ST-100	Self Test Fixture for 5000 Series (included w/purchase of new Tester)
ST-200	Self Test Fixture for Low Current Deck (included w/purchase of new Low Current Deck)
ST-300	Self Test Fixture for Multiplexer (included w/purchase of new Multiplexer)
ST-345	Self Test Fixture for ADP-340-5 or ADP-340-5-G (included w/purchase of new ADP-340-5)
ST-601	Self Test Fixture for ADP-401A (included w/purchase of new ADP-401A)
TEST FIXTURES - DISCRETE / SURFACE MOUNT (SOME AVAILABLE W/ KELVIN DUAL CONTACTS FOR DRIVE AND SENSE)	
FXK-220	TO-220/218 (A Version Anode Center Pin) (G Version Gate Center Pin) **Please consult factory for any discrete or surface mount device test fixture not listed.** **If sockets are available STI can build a fixture per customer request.**
FX-UW	Any Fixture Wired for universal pin connection (Requires FX-CAB-UW)
FX-CAB-UW	Universally Wired Fixture Cable for universally wired fixtures
TEST FIXTURES - DISCRETE OPTO-COUPLER (ALL OPTO FIXTURES REQUIRE ADP-310)	
	Consult Factory for Pricing
TEST FIXTURES - PERSONALITY (FOR PROGRAMMABLE SCANNERS ADP-401 AND ADP-401A)	
FX-8P-BLNK	8P Blank Test Fixture for ADP-401A-8
FX-16P-BLNK	16P Blank Test Fixture for ADP-401A-8
FX-8P	2 to 8 Pin Test Fixture for ADP-401A-8 (any available 2 to 8 pin socket)
FX-16P	2 to 16 Pin Test Fixture for ADP-401A-16 (any available 2 to 16 pin socket)
FX-VCC	Adds Pin Assignable VCC and Logic 1 and 0 to FX-8P, FX-16P

PART NUMBER	DESCRIPTION

TEST FIXTURES - ACCESSORIES

FX-BLNK	Blank Fixture Enclosure drilled with Tester pattern (includes plugs, ferrite beads, coil and hardware)
FX-BLNKPCB	Blank Fixture Enclosure drilled with Tester pattern, and PCB cut out (includes pcb, plugs, ferrite beads, coil and hardware)
FX-COIL	Oscillation Suppression Coil
FX-SCKT	Replacement Sockets for Fixtures

CABLES (DEVICE CABLE AND CONTROL CABLE RECOMMENDED FOR USE WITH HANDLER/PROBER)

HAC-100	9 Pin Null Modem Cable
HCB-125	LC-1000 Control Cable, 6' (50p Centronics to 50p Centronics)
HCB-150	Handler Device Cable, 6'
HCB-200	Handler Control Cable, 6' (SOT, EOT, Fail, Bins, etc…) (25p D-Sub P to 25p D-Sub S)
HCB-301	Interconnect Cable from Tester to HCD and Adaptors
HCB-301K	HCB-301 with Kelvin
HCB-340-5	Handler Device Cable for ADP-340-5G 6'
HCB-360	Cable for 9p D-Sub Plug to Socket 6' or 10'
HCB-401-8	Handler Device Cable for ADP-401-8 Scanner
HCB-401-16	Handler Device Cable for ADP-401-16 Scanner
HCB-410	Handler Device Cable from ADP-410 (Adaptor to Un-terminated leads)
HCB-500	HC-500 Handler Device Cable 6' (200A Max)
HCB-502	HC Anode and Cathode Cable for Device
HCB-A615	AUX Control Cable (6p Circular P to 6p Circular S)

INTERFACE BOARDS

EXT-200	External Control Board, Provides SOT test receives EOT(U1-12) and Pass/Fail(U1-13), 15 Relay Drivers
PI-200	Prober Interface Card
HI-100	Handler Interface Card, Relay Closure, 16 Bins

CLIENT LIST

* Indicates that customer has multiple installations.

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