

To: DIKST ITS
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Attn.:
Telp.:
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QUOTATION

WAS065/0826/SW

Date: 11-08-2026

Rev 00

No.	Description	Qty.	Unit Price	Total Price
1	THERMO SCIENTIFIC ISQ 7610 Gas Chromatography Mass Spectrometry GCMS NeverVent FID TCD DUAL TOWER AUTO SAMPLER GC Technical Specifications Type : TRACE 1610 Brand : Thermo Scientific Link E Katalog : https://katalog.inaproc.id/pt-wiralab-analitika-solusindo/thermo-scientific-isq-7610-gas-chromatography-mass-spectrometry-gcms-nevervent-fid-tcd-dual-tower-auto-sampler Performance Specifications • Heated zones: up to seven with TRACE 1600/1610 GC, or up to nine with the TRACE 1600 Auxiliary Oven • Time events: 63 user-selectable events • Support up to eight valves or 16 valves with the TRACE 1600 Auxiliary Oven 27 × 27 × 17.7 cm; 12.9 L • Typical retention time repeatability*: <0.0008 min • Typical peak area repeatability*: <0.3% RSD GC oven • Oven Dimensions (H x W x D): 27 cm x 27 cm x 17.7 cm; Volume: 12.9 L • Hosts up to two capillary columns 105 m length and 0.53 mm I.D. • Integrated oven light • Operating temperature range: ambient +3 °C to 450 °C • Temperature set point resolution: 0.1 °C • Number of ramps/plateaus: 32/33 • Maximum heating rate setting: 125 °C/min • Oven cool down (22 °C ambient): 450 °C to 50 °C in less than 4 minutes • Ambient rejection: < 0.01 °C per 1 °C Integrated Electronic Control (IEC) Gas specification • Up to 18 channels of integrated electronic gas control - Pressure set points minimum increments: 0.01 kPa (0.001 psi) for entire range of 0-150 psi - Temperature pressure variation: max ±0.07 kPa/°C (±0.01 psi/°C) - Pressure accuracy: <±1% (FS)	1	IDR 2.437.160.400	IDR 2.437.160.400



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	• Pressure set point precision: ± 0.3 kPa - Carrier gas control common to all injectors (0.001 psi) for entire range of 0- - Split ratio: up to 12500:1 - Pressure range: 0-1050 kPa (0 - 150 psi) Pneumatic control modes • Constant and programmed pressures • Constant and programmed flows • Constant linear velocity • Surged pressure split injection • Surged pressure splitless injection Total flow setting • Split flow: OFF or from 0-1250 mL/min in 0.1 mL/min increments • Reduced split flow after injection with Gas Saver option • Purge flow: OFF or from 0.5-50 mL/min in 0.1 mL/min increments Injectors • Maximum number installed: 2 (except for TSI injector which occupies two injector slots) • Available as Instant Connect, user-exchangeable modules Instant Connect Split/Splitless Injector (SSL) • Cold head injector suitable for fast injections (liquid band injections) • Suitable for all capillary columns of 0.05 mm to 0.53 mm I.D. • Supports CSR large volume injection (concurrent solvent re-condensation) • Compatible with 1/8" and 1/16" packed column using adapters • Supports P&T/TD/HS/Pyrolyzer with dedicated adapters • Compatible with Merlin Microseal septum • Maximum temperature: 400 °C • Dedicated Split/Splitless injector with integrated concurrent backflush capabilities, offering the same specifications, is also available • Secondary cooling • Suitable for manual and automated injection • Compatible with syringes with 85 mm, 26 gauge conic needle for 0.53 mm I.D. columns	2		
	Mass Spectrophotometer (MS) Detector Type : ISQ 7610 Brand : Thermo Scientific Mass Specifications Mode • Electron Ionization (EI), Chemical Ionization (CI), with full-scan (FS), SIM, and FS/SIM simultaneous within sample injection • AutoSIM and timed acquisition (t-SIM) Ion Source Type • Thermo Scientific™ ExtractaBrite™ Electron Ionization (EI) source with dual filaments in all ionization modes, programmable to 350 °C • Programmable to 350 °C NeverVent technology • Exclusively available on VPI-enabled systems, V-Lock isolates the vacuum region of the mass spectrometer from the column—this enables an industry exclusive method to change GC columns quickly, with no venting required Mass filter and mass analyzer	1		

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	• Dual-stage mass filter with off-axis ion guide pre-filter for noise reduction and solid, homogeneous non-coated, maintenance-free quadrupole rods • Independently heated zones for: transfer line, ion source, and ion optics/mass analyzer • Fast quadrupole scanning, up to 20,000 u/s Mass Sensitivity • In EI mode, 1 µL of 1 pg/µL octafluoronaphthalene (OFN) will produce the following minimum signal- to-noise for m/z 272 when scanning 50–300 u = 2000 : 1 Mass Stability • Better than 0.1 u/48 hours/ΔT ≤ 2 K Detector • Thermo Scientific™ XLXR™ detection system, with off-axis 10 kV dynode, discrete dynode electron multiplier and electrometer, linear range of >10⁷ (0–110 µA) • Electrical dynamic range > 10⁹ Mass Range • 1.2–1100 u with unit mass resolution Acquisition Rate • Ability to acquire more than 240 scans/s in SIM • Ability to acquire more than 97 scans/s in FS when scanning over a range of 125 u Pumping Systems Extended capacity (300 L/s) turbomolecular pump Mechanical rotary vane 3.3 m³/h oil pump Electron Energy : Adjustable from 0 eV to 150 eV Emission Current : Up to 350 µA Transfer Line Temperature : Up to 400 °C Electron Energy • Adjustable from 0 eV to 150 eV Emission Current • Up to 350 µA Transfer Line Temperature • Up to 400 °C Standard Installation Specifications In EI mode, 1 µL of 1 pg/µL octafluoronaphthalene (OFN) will produce the following minimum signal-to-noise for m/z 272 when scanning 50–300 u = 2000 : 1 In PCI mode, 1 µL of 100 pg/µL benzophenone will produce the following minimum signal-to-noise for m/z 183 when scanning 80–230 u using methane reagent gas = 300 : 1 In NCI mode, 2 µL of 100 fg/µL of OFN will produce the following minimum signal-to-noise for m/z 272 when scanning 50–300 u using methane reagent gas = 2000 : 1 Detector modules Instant Connect Thermal Conductivity Detector (TCD) Capillary column optimized (micro TCD) compatible with 1/8" and 1/16" packed column • Maximum temperature: 400 °C in steps of 0.1 °C • MDL: <400 pg tridecane/mL with He carrier or <20 pg tridecane/s with a total flow through the cell of 3 mL/min	1		

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	* Linear dynamic range: 105 Maximum temperature: 450 °C in steps of 0.1 °C Instant Connect Flame Ionization Detector (FID) Capillary column optimized compatible with 1/8" and 1/16" packed column Flameout detection and automatic re-ignition Minimum Detectable Level (MDL) : <1.2 pg C/s Sensitivity : 0.03 Coulombs/gC Linear dynamic range : >107 (±10%) Maximum temperature : 450 °C in steps of 0.1 °C IEC : Air: 0–500 mL/min in 0.1 steps, H2: 0–100 mL/min in 0.1 steps	1		
	Autosampler Type : AS 1610 GEMINI Liquid Autosampler Brand : Thermo Scientific Sample Loading Capacity : 310 • Vial capacity: 2 mL • Standard: 10 µL	1		
	PC & Printer	1		
	PC Minimum Intel(R) Core i7™, LED Monitor, Multifunction Printer	1		
	Completed with :			
	Chromeleon GC/MS Software	1		
	Capillary Column	2		
	NIST Library with RI & MS/MS	1		
	Base Plate for 3 filters	1		
	Cartridge Pack – contains 1 x Triple Filter and 2 x Combi Filter (Moisture, Hydrocarbons)	1		
	-Gas Helium UHP (He) Purity 99,999 and Cylinder	1		
	-Regulator He	1		
	Gas Nitrogen UHP (N2) Purity 99,999 an Cylinder	1		
	Regulator N2	1		
	Gas Hydrogen UHP (H2) Purity 99,999 and Cylinder	1		
	Regulator H2	1		
	Oil less air compressors	1		
	Piping Set	4		
	UPS 6 KVA	1		

Term & Condition :

Price: Franco at Jakarta in IDR

Deliver: 2-3 weeks after received of PO

Payme 100% after installation & training

Validit 4 (four) weeks

Your Faithfully,



Sales Government Asst. Manager

Sales Engineer

PT Wiralab Analitika Solusindo