

Item	AFFINIX QN	AFFINIX QN $\mu$ (Micro)	AFFINIX QN Pro	AFFINIX Q8
Model	QCM2008-STKIT	QCM2008-LVKIT	QCM2008-PRKIT	QCM2012(Standard Model)/ QCM2012E(Limited Function Model)
Measurement Principle · System	Quartz Crystal Microbalance(QCM) oscillation	Quartz Crystal Microbalance(QCM) oscillation	Quartz Crystal Microbalance (QCM) · Admittance Analysis Methods	Quartz Crystal Microbalance(QCM) oscillation
Measurement Frequency · Sensitivity	27MHz(Fundamental frequency) 30pg/Hz	27MHz(Fundamental frequency) 30pg/Hz	27MHz (Fundamental) · 30pg/Hz 81MHz (Overtone) · 10pg/Hz	27MHz(Fundamental frequency) 30pg/Hz(620pg/cm <sup>2</sup> · Hz)
Dynamic Range	100pg(per sensor)	100pg(per sensor)	100pg~10 $\mu$ g	100pg~10 $\mu$ g(2ng/cm <sup>2</sup> ~200 $\mu$ g/cm <sup>2</sup> )
Oscillation Stability	Noise $\leq$ 1 Hz(distilled water, 25°C, at stable state)	Noise $\leq$ 2 Hz(27MHz, distilled water, 25°C, at stable state)	Noise $\leq$ 2 Hz(27MHz, distilled water, 25°C, at stable state)	Noise $\leq$ 1 Hz(27MHz, distilled water, 25°C, at stable state)
Average Drift	$\leq$ 1 Hz/min(distilled water, 25°C, at stable state)	$\leq$ 1 Hz/min(distilled water, 25°C, at stable state)	$\leq$ 1 Hz/min (27MHz, distilled water, 25°C, at stable state)	$\leq$ 1 Hz/min(distilled water, 25°C, at stable state)
Injection System	Manual, Multiple injection is possible	Manual, Multiple injection is possible	Manual, Multiple injection is possible	Manual, Multiple injection is possible
Min. Injection Volume	0.1 $\mu$ L~ (dependent on micropipette to be used)	0.1 $\mu$ L~ (dependent on micropipette to be used)	0.1 $\mu$ L~ (dependent on micropipette to be used)	0.1 $\mu$ L~ (dependent on micropipette to be used)
Channel Number	1	1	1	8
Cup Volume	Glass cell[5~11mL]※Consumable mini cell[1.6mL]	400~550 $\mu$ L	400~550 $\mu$ L	80~120 $\mu$ L
Sensor Type	Ceramic sensor chip	Sensor cell	Sensor Cup (specific for QN Pro)	Sensor with a removable cup Stirrers driven by motors
Stir Method	Magnetic Stirrer	Magnetic Stirrer	Magnetic Stirrer	0~3,000rpm(setting step : 100rpm) 3,000 rpm(fixed)
Temp. Control System	Peltier	Peltier	Peltier	Peltier
Setting Temperature	0.1~50.0°C(step : 0.1°C)	10.0~50.0°C(step : 0.1°C)	10.0~60.0°C(step : 0.1°C)	10.0~40.0°C(step : 0.1°C) ※Range applicable to standard model only with minimum set temp. 10°C below room temp. ※※25°C fixed for Limited Function Model
System Software	Measuring software (PC limited license pre-installed in provided PC, there is no installer disc) Install-free data viewer software included by default in CD	Measuring software (PC limited license pre-installed in provided PC, there is no installer disc) Install-free data viewer software included by default in CD	Measuring software : 『AFFINIX QN Pro』 (PC limited license pre-installed in provided PC, there is no installer disc) Data viewer software : 『AFFINIX QN Pro Viewer』 (The installer is saved in PC and an additional disc)	Measuring software (PC limited license pre-installed in provided PC, there is no installer disc) Install-free data viewer software included by default in CD
Date Processing Part	Windows Laptop PC	Windows Laptop PC	Windows Laptop PC	Windows Laptop PC
Communication System	Ethernet Virtual serial	Ethernet Virtual serial	Ethernet Virtual serial PC card	Ethernet Virtual serial
Output parameters	-	-	Fs,F2,Fw,Q,D,R,(C0,C1,L1)	-
Operating Environment	20~30°C(Recommended)	20~30°C(Recommended)	20~30°C(Recommended)	20~30°C(Recommended)
Size	140W × 350D × 220H(mm)	140W × 350D × 220H(mm)	140W × 300D × 220H(mm) (AFFINIX QN main unit) 71W × 360D × 144H(mm) (Analysing unit)	220W × 410D × 170H(mm) (AFFINIX Q8 main unit)
Weight	7.7kg	7.1kg	9.0kg	7.0kg (Affinix Q8 main unit only)
Power Supply	AC 100~240V, 1A	AC 100~240V, 1A	AC 100~240V, 3A (Body : 1A, Analyzing Unit : 2A)	AC 100~240V, 1A (Affinix Q8 main unit only)
Optional accessory	Data Analysis Software AFFINIX Q User Analysis (AQUA) Installer CD	Data Analysis Software AFFINIX Q User Analysis (AQUA) Installer CD	Data Analysis Software(AQUA) AFFINIX QN Pro Base Equipment(1) Communication /	Data Analysis Software AFFINIX Q User Analysis (AQUA) Installer CD
Standard items	AFFINIX QN Base Equipment(1) Software included PC(1) PC accessories(with LAN Cable)(1) Glass cell(1) Stirrer(1) USB memory stick(1) Sensor chips(4 in a case) Instruction Manual(1) Data Viewer(1)	AFFINIX QN $\mu$ Base Equipment(1) Software included PC(1) PC accessories(with LAN Cable)(1) Cell cover with stirrer(1) USB memory stick(1) Sensor cells(4 in a case) Instruction Manual(1) Data Viewer(1)	Measurement Kit(1) Measurement Control Software included PC(1) PC accessories(with LAN Cable)(1) Instruction Manual(1) Cell Cover with Stirring Bar(1) USB memory stick(1) Sensor cups(4 pieces/case(1)) Calibration Set(1) Data Viewer(1)	AFFINIX Q8 Base Equipment(1) Software included PC(1) PC accessories(with LAN Cable)(1) Instruction Manual(1) Sensor holder(1) Sensor tray sensor pack(8 in a set) Data Viewer(1)
PC Spec.	PC with pre-installed measurement software	PC with pre-installed measurement software	PC with pre-installed measurement software	PC with pre-installed measurement softwa