

SAMPLING SOLUTIONS

For Green Building/IEQ Testing

Recognition

Green buildings have a minimal impact on the environment and are healthy for building occupants. A key environmental category for green building certification is indoor environmental quality (IEQ). IEQ includes moisture control, contaminant control, occupant comfort, and ventilation. IEQ studies are frequently done for formaldehyde, volatile organic compounds (VOCs), carbon monoxide, particulates, lighting, and thermal comfort.

SKC offers solutions for active and passive air sampling and direct-reading monitoring for green building/IEQ testing. SKC active samplers require an air sample pump to collect hazardous gases, vapors, and particulates in air; passive samplers collect hazardous vapors by diffusion without the use of an air sample pump.

See the SKC equipment recommended for green building/IEQ testing.

Evaluation with SKC Sampling Solutions

For over 50 years, SKC has led the research, design, and manufacture of quality sampling equipment and media to aid health and safety professionals in the evaluation of occupational and environmental hazards.

Choose from the many SKC sampling solutions for green building/IEQ testing, ranging from air sample pumps, active and passive samplers, filters, and sorbent tubes to innovative portable instruments following agency methods and established protocols.

See reverse side for specific method and sampling equipment/media information.

Sample Collection

Active Air Sampling Solutions

Target Compound or IAQ Criteria	Select Methods*	SKC Sample Collection Media/Sampler and Cat. No.	SKC Sample Pump and Cat. No.	Notes
Formaldehyde	EPA IP-6	Sorbent tube 226-119 or 226-120	Pocket Pump TOUCH 220-1000TC	226-120 is used in the presence of ozone.
Mold	<i>See SKC Sampling Solutions for Mold and Other Bioaerosols, SKC Publication 1847.</i>			
PM10 or PM2.5	EPA IP-10A	PTFE filter 225-1709 with Personal Environmental Monitor (PEM) 761 Series . Flow rate determines pumps recommended. See <i>below</i> :		Single stage impactor Choose model for desired PM size and flow rate.
		2 or 4 L/min PEM	AirChek® TOUCH 220-5000TC	
		10 L/min PEM	Leland Legacy® 100-3002	
	EPA IP-10A equivalent samplers	PTFE filter 225-1709 or quartz filter 225-1822 with Personal Modular Impactor (PMI) 225-350 or 225-352	AirChek TOUCH 220-5000TC	Single-stage impactor with a designated flow rate of 3 L/min. Choose model for desired PM size. <i>Requires 225-355 impaction substrates</i>
	EPA IP-10A equivalent samplers	PTFE filter 225-1747 or quartz filter 225-1823 with IMPACT Sampler 225-390 or 225-392	Leland Legacy 100-3002	Single-stage impactor with a designated flow rate of 10 L/min. Choose model for desired PM size. <i>Requires 225-395 impaction substrates</i>
	ASTM D4861	Low-volume PUF Tubes 226-124	Leland Legacy 100-3002	Sample times up to 24 hours
Polychlorinated biphenyls (PCBs)				
VOCs	EPA TO-17	Thermal desorption sorbent tube 226-300 Series	Pocket Pump TOUCH 220-1000TC	Coordinate with laboratory prior to sampling to confirm requirements/logistics.

Passive Air Sampling Solutions

Target Compound	Select Methods*/SKC Validation	SKC Sample Collection Media and Cat. No.	Notes
Formaldehyde	EPA IP-6C , OSHA 1007 /Research Reports 1608 and 1661	UMEX ¹⁰⁰ 500-100	HPLC analysis
Organic vapors	EPA TO-17 /Research Report 1812	ULTRA [®] 690 Series	Ideal alternative to canisters

Direct-reading Instruments

For Monitoring/Measuring	Instrument and SKC Cat. No.	Notes
Carbon dioxide	IAQ Meter/Datalogger 850-048 or 850-050	
Light	Light Meter 850-020 or 850-022	
Multiple chemical parameters	HAZ-SCANNER IEMS 770-800	Measures 7 critical parameters Measures up to 14 indoor parameters
Particulate matter	EPAM 5000	Filter option for lab analysis

* Other methods may apply. SKC recommends those listed.