

## SmartSense™ Recessed Ceiling Exhaust Fan

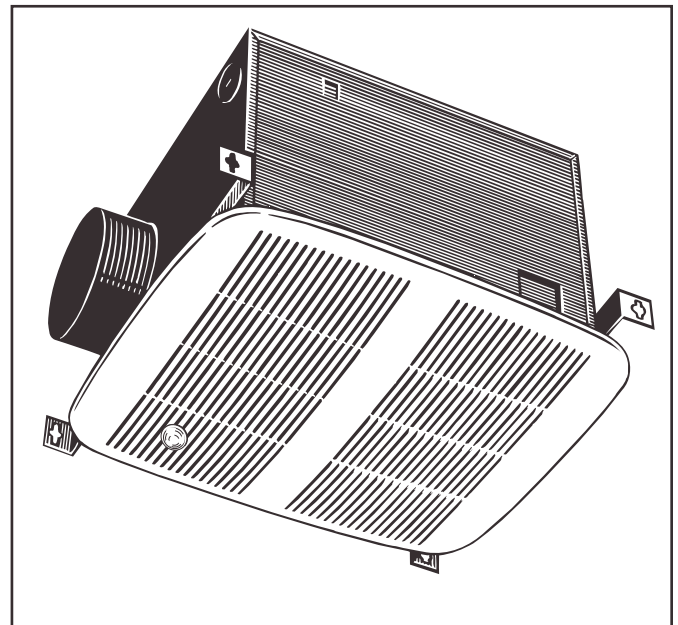
MODEL: QT110H

### DESCRIPTION

- For bathrooms up to 105 sq. ft., other rooms up to 135 sq. ft.
- Fan automatically activated by excessive humidity. User adjustable shut off delay time.
- White polymeric grille held firmly in place with torsion springs; easily removed if necessary.
- Centrifugal blower wheel is electronically balanced for smooth, quiet operation.
- Built-in non-metallic damper quietly helps prevent backdraft.
- Motor is cushioned with vibration isolators.
- Prewired outlet box is built into housing; features a plug-in receptacle.
- Choice of two (2) knockouts for wiring entrance.
- Adjustable hanger brackets for mounting between ceiling joists 16" O.C.
- Ducts horizontally with 4" duct.
- Refer to NuTone's catalog for a complete line of accessories to effectively adapt these fans to your construction requirements.

### DESIGN FEATURES

- Automatic Activation:** Fan automatically activates when humidity exceeds prescribed limits. Delay time is user adjustable.
- Air Delivery:** 110 CFM at 0.1" S.P.
- Sound Level:** 3.0 sones
- Dimensions:** **Housing:** 9<sup>3</sup>/<sub>8</sub>" x 11<sup>1</sup>/<sub>4</sub>" 7<sup>7</sup>/<sub>8</sub>".  
**Grille:** 14<sup>1</sup>/<sub>4</sub>" x 12<sup>1</sup>/<sub>16</sub>".  
Extends <sup>5</sup>/<sub>8</sub>" below ceiling.
- Material & Finish:** **Housing:** Cold rolled steel, baked enamel finish.  
**Grille:** White Polymeric.
- Motor:** Plug-in. Thermally protected. Sleeve bearings.
- Electrical Rating:** .65 amps, 120 volts.
- Impeller:** One centrifugal type. 5<sup>3</sup>/<sub>4</sub>" dia. x 2" wide.
- Damper:** Polypropylene.



### INSTALLATION

- Not for use in kitchens.
- UL Listed for shower/tub enclosure when used with GFI branch circuit wiring.
- Suitable for installation in direct contact with thermal insulation.
- Housing installs in ceiling to 16" on center joists with adjustable brackets. In existing construction, the unit requires a 9<sup>1</sup>/<sub>2</sub>" x 11<sup>1</sup>/<sub>2</sub>" cutout.
- Motor/blower wheel assembly and grille are installed when finished ceiling is in place.
- Grille snaps into place and is held securely with torsion springs.
- Complete installation instructions included with each unit.

### ARCHITECT'S SPECIFICATIONS

Exhaust Fan shall be Model QT110H as manufactured by NuTone according to listed specifications.

## CERTIFIED TEST DATA

HVI-2100 CERTIFIED RATINGS comply with new testing technologies and procedures prescribed by the Home Ventilating Institute, for off-the-shelf products, as they are available to consumers. Product performance is rated at 0.1 in. static pressure, based on tests conducted in AMCA's state-of-the-art test laboratory. Sones are a measure of humanly-perceived loudness, based on laboratory measurements. This NuTone model is listed by Underwriters' Laboratories Inc. and Certified by the Canadian Standards Association (CSA.)

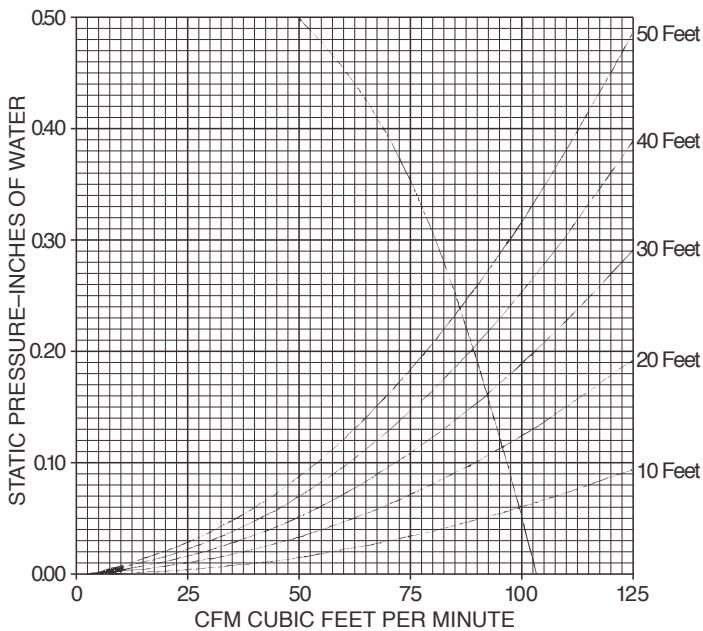


The air delivery of a ventilating system may be determined by:

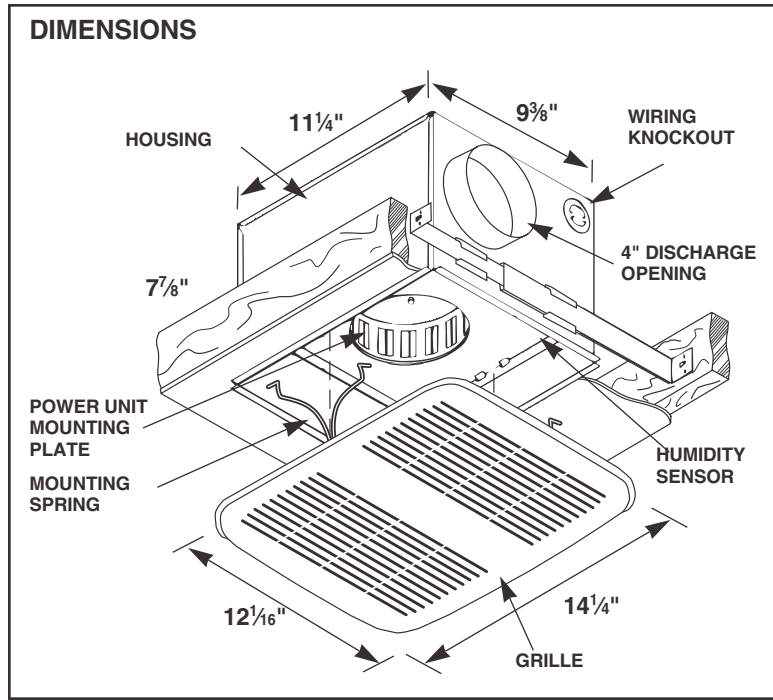
1. Determine the equivalent duct length for each 90 degree elbow by adding one foot of duct length for each inch of duct diameter, i.e., a 4 inch diameter duct elbow equals 4 feet equivalent duct length and an 8 inch diameter duct elbow equals 8 feet equivalent duct length.
2. Add the total straight length of duct and the equivalent length for each elbow to obtain the total equivalent duct length.
3. Locate the intersection of the fan performance curve and the total equivalent duct length curves and draw a vertical line down to the CFM scale and read the system air performance.

(NOTE: 3/4" x 10" duct equals 6 inch diameter duct.)

**AIR PERFORMANCE CURVE – QT110H**  
(4 In. Duct to 10 Foot Lengths)



STATIC PRESSURE INCHES OF WATER	0.05	0.1	0.15	0.2	0.25	0.3	0.35	0.4	0.45
CFM	116	112	106	100	94	88	83	77	70



Product specifications subject to change without notice.