1 General

1.1 REFERENCES

.1 Air Movement and Control Association International, Inc. (AMCA).
- .1 AMCA 99-1986, Standards Handbook.
- .2 ANSI/AMCA 210-1985, Laboratory Methods of Testing Fans for Rating.
- .3 AMCA 300-1985 Revised 1987, Reverberant Room Method for Sound Testing of Fans.
- .4 AMCA 301-1990, Methods for Calculating Fan Sound Ratings from Laboratory Test Data.

.2 American Society of Heating, Refrigeration and Air-Conditioning Engineers (ASHRAE).
- .1 ANSI/ASHRAE 51-1985, Laboratory Methods of Testing Fans for Rating.

.3 Canadian General Standards Board (CGSB).
- .1 CGSB 1-GP-181M-77, Coating, Zinc Rich, Organic, Ready Mixed.

1.2 SHOP DRAWINGS AND PRODUCT DATA

.1 Submit shop drawings and product data in accordance with Section 01 33 00 - Submittal Procedures.

.2 Provide fan curves and sound rating data, showing point of operation, electrical data, dimensions, construction and accessories.

1.3 OPERATION AND MAINTENANCE DATA

.1 Provide operation and maintenance data for incorporation into manual specified in Section 01 10 01 - General Requirements.

1.4 MANUFACTURED ITEMS

.1 Catalogued or published ratings shall be those obtained from tests carried out by manufacturer or those ordered by him from independent testing agency signifying adherence to codes and standards in force.

.2 Provide confirmation of testing.

2 Products

2.1 FANS GENERAL

.1 Fans: statically and dynamically balanced, constructed in conformity with AMCA 99.

.2 Sound ratings: comply with AMCA (Air Moving and Conditioning Association) 301, tested to AMCA 300. Unit shall bear AMCA certified sound rating seal.

.3 Performance ratings: based on tests performed in accordance with ANSI/AMCA 210, and ANSI/ASHRAE 51. Unit shall bear AMCA certified rating seal.

.4 Factory primed before assembly in colour standard to manufacturer.

2.2 DIRECT DRIVE EXHAUST FAN (EF-101)

.1 Fan wheels:
- .1 Welded aluminum construction.
- .2 Maximum operating speed of fan not more than 25% of first critical speed.
- .3 Cast aluminum air foil blades.

.2 Bearings; heavy duty, split pillow-block grease lubricated ball or roller self-aligning type with oil retaining, dust excluding seals and a certified minimum rated life of 200,000 hours.

.3 Housings:
- .1 Galvanized steel frame, access from building interior.
- .2 Motor side guard (OSHA approved) and 18 ga. Galvanized 90 degree weatherhood c/w 12mm x 12mm bird screen.
- .3 Multi-blade motorized damper with 120 VAC actuator.
- .4 Fan housing sized to fit existing building opening (approximate 915mm X 915mm)

.4 Performance:
- .1 Airflow 1652 L/S (3500 cfm) at 250 Pa (1") TSP when driven by a 2 hp/208 V/60 Hz/3 phase factory mounted TEFC premium efficient inverter duty motor, and thermal overload protection.

3 Execution

3.1 FAN INSTALLATION

.1 Install fan as indicated, complete with flexible electrical leads and flexible connections.

.2 Bearings and extension tubes to be easily accessible.

.3 Access doors and access panels to be easily accessible.

END OF SECTION