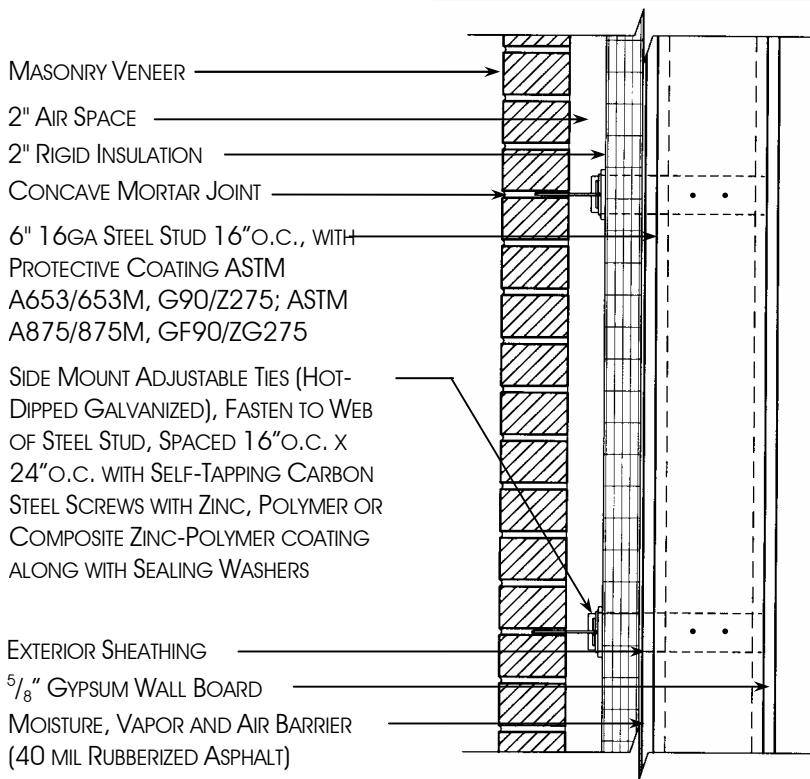


# BRICK VENEER STEEL STUD BACKUP-1

NON-LOADBEARING/INFILL

COST: \$34.51/sf\*



## ADVANTAGES

- BACK-UP PROVIDES TEMPORARY ENCLOSURE DURING CONSTRUCTION
- EXCELLENT WATER RESISTANCE TO WIND-DRIVEN RAIN
- FIRE RATING-1 HOUR ON EXTERIOR MASONRY SURFACE
- GOOD THERMAL RESISTANCE
- INSULATION RETAINER CLIP POSITIVELY SECURES INSULATION
- SCREWS IN SHEAR – GREATER CAPACITY
- THERMAL MASS CONSIDERATION FOR MASONRY VENEER
- WEIGHT OF WALL

## DISADVANTAGES/CONCERNS

- CONDUCT A CONDENSATION ANALYSIS
  - DEW POINT TO OCCUR OUTSIDE OF STUDS
- FIBERGLASS FACED GYPSUM SHEATHING
  - ADHESION CONCERNS WITH RUBBERIZED ASPHALT ON COLD, DAMP, AND/OR DUSTY SUBSTRATES
  - MINIMUM TEMPERATURE REQUIRED FOR INSTALLATION OF JOINT SEALANT
    - RUBBERIZED ASPHALT MAY NOT BE REQUIRED FOR PROPERLY SEALED JOINTS
  - PUNCH HOLES MAY DETERIORATE
- HIGHER MAINTENANCE COST
- INTERIOR FINISH HAS LOW ABUSE RESISTANCE
- L/600 MINIMUM DEFLECTION (BIA RECOMMENDATION)
  - ALLOWS MAXIMUM CRACK WIDTH OF .015" IN MASONRY VENEER
- L/600-L/900 DEFLECTION (SUGGESTED RANGE)
  - L/900 WILL REDUCE SIZE AND FREQUENCY OF MASONRY VENEER CRACKS
- MAINTENANCE – INSPECT PERIODICALLY (PER BIA 28B REVISED NOVEMBER 1999)
- MASONRY VENEER HEIGHT LIMITED
  - 30 FEET AT PLATE
  - 38 FEET AT GABLE
- NO FIELD WELDING OF STUDS SHOULD BE PERMITTED
- REQUIRES SEAL AROUND ALL OPENINGS WHERE MOISTURE, VAPOR AND AIR BARRIER HAS BEEN PENETRATED BY TIES
- REQUIRES SPECIAL MOISTURE CONSIDERATION FOR PARAPET WALLS WITH STEEL STUDS
- SHELF ANGLES SHOULD BE SUPPORTED BY STRUCTURAL STEEL AND NOT BY STEEL STUDS
  - REQUIRES A HORIZONTAL EXPANSION JOINT BENEATH SHELF ANGLE
- SHOP WELDING MAY BE PERMITTED WITH A MINIMUM 14 GAUGE
  - GALVANIZING MUST BE REPAIRED TO ASTM STANDARDS

\*THE FIGURES REPRESENT TOTAL COST INCLUDING LABOR, MATERIAL, OVERHEAD, AND PROFIT. ALL MASONRY WALL COSTS WERE BASED ON A STRAIGHT RUN WALL WITH NO OPENINGS. THE COST WILL BE GREATER WHEN CONSIDERING OPENINGS, CORNERS, SITE CONDITIONS, MATERIAL HANDLING CONDITIONS AND WEATHER. USE FOR COMPARATIVE PURPOSES ONLY AND NOT AS AN ESTIMATE.