SEISMIC ANCHORAGE


WEIGHT = 1653 LBS
HORIZONTAL FORCE \( (E_h) = 0.90W_h = 1488 \text{ LBS} \)
VERTICAL FORCE \( (E_v) = 0.40W_v = 661 \text{ LBS} \)

BOLT FORCES:

TENSION (T)
\[
T_{\text{MAX}} = \left[ \frac{1488\#(34.75')}{2\text{bolts}(29''')} \times (0.3) \right] + \left[ \frac{1488\#(34.75')}{2\text{bolts}(29''')} \times \frac{1653\#(0.9) - 661\#}{4\text{bolts}} \right] = 952 \text{ LBS/BOLT (MAX)}
\]

SHEAR (V)
\[
V_{\text{MAX}} = \frac{1488\#}{4\text{bolts}} = 372 \text{ LBS/BOLT (MAX)}
\]

NOTE:
PROVIDE FLOOR STRUCTURE DESIGNED TO SUPPORT WEIGHTS AND FORCES SHOWN.
(BY ENGINEER OF RECORD FOR THE BUILDING)
WEIGHT = 1653 LBS
HORIZONTAL FORCE ($E_h$) = 144W_h = 2380 LBS
VERTICAL FORCE ($E_v$) = 0.40W_v = 661 LBS

BOLT FORCES:

TENSION (T)

$$T_{\text{MAXIMUM}} = \frac{2380 \#(34.75')}{2 \text{bolts}(29')} \times (0.3) + \frac{2380 \#(34.75')}{2 \text{bolts}(29')} - \frac{1653 \#(0.9)}{4 \text{bolts}} - \frac{661\#}{4 \text{bolts}} = 1647 \text{ LBS/BOLT (MAX)}$$

SHEAR (V)

$$V_{\text{MAXIMUM}} = \frac{2380\#}{4 \text{bolts}} = 595 \text{ LBS/BOLT (MAX)}$$

NOTE:
PROVIDE FLOOR STRUCTURE DESIGNED TO SUPPORT WEIGHTS AND FORCES SHOWN.
BY ENGINEER OF RECORD FOR THE BUILDING.