**30'x30' POST-TENSIONED CONCRETE FLAT PLATE OFFICE BAY**

**INCLUDED IN LCA:**
- CONCRETE = 6,000 PSI, NORMALWEIGHT, 0% SCM - 8" THICK
- (1) STEEL STUD RAIL ASSEMBLY - 10 LBS TO 96 LBS
- 7-STRAND, 1/2"Ø, 270 KSI POST-TENSIONING TENDONS
  - 17 TO 22 ON ONE BANDED LINE
  - 18 TO 22.5 PER BAY IN UNIFORM DIRECTION
- ASTM A615, GRADE 60 REBAR - 0.55 TO 3.45 PSF

**NOTE:** ITALICS INDICATES ITEMS WITH VARIABLE DESIGN BY DIFFERENT DESIGNERS.

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**PROJECT**  SEI SE2050 Working Group

**TITLE**  Embodied Carbon Intensity Diagrams
NOTES:

1. LOADING CRITERIA:
   SDL: 10 PSF   LL: 50 (R) + 15 PSF (NR - PARTITIONS)

2. MATERIAL CRITERIA:
   CONCRETE: $f'_c = 6,000$ PSI, $f'_c = DESIGNER'S$ CHOICE
   REINFORCEMENT = ASTM A615, GRADE 60
   POST TENSIONING = 7-STRAND, 1/2" NOMINAL DIAMETER, ASTM A416, 270 KSI

3. DESIGN FOR 2 HOUR FIRE RATING.

ADDITIONAL DESIGN OUTPUT:

1. LBS STUD RAIL AT ONE TYPICAL COLUMN
2. LBS REBAR TOTAL IN BAY