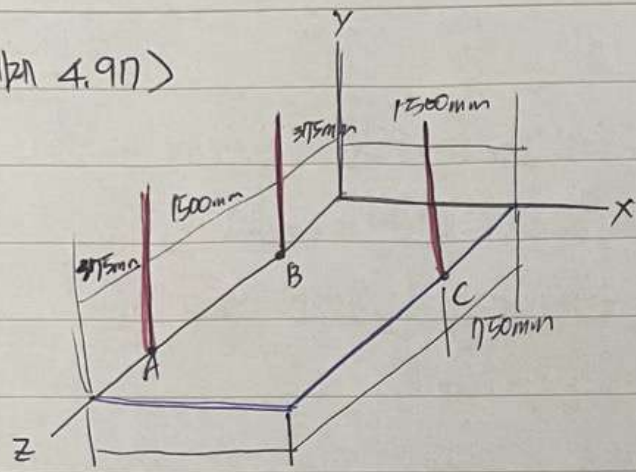
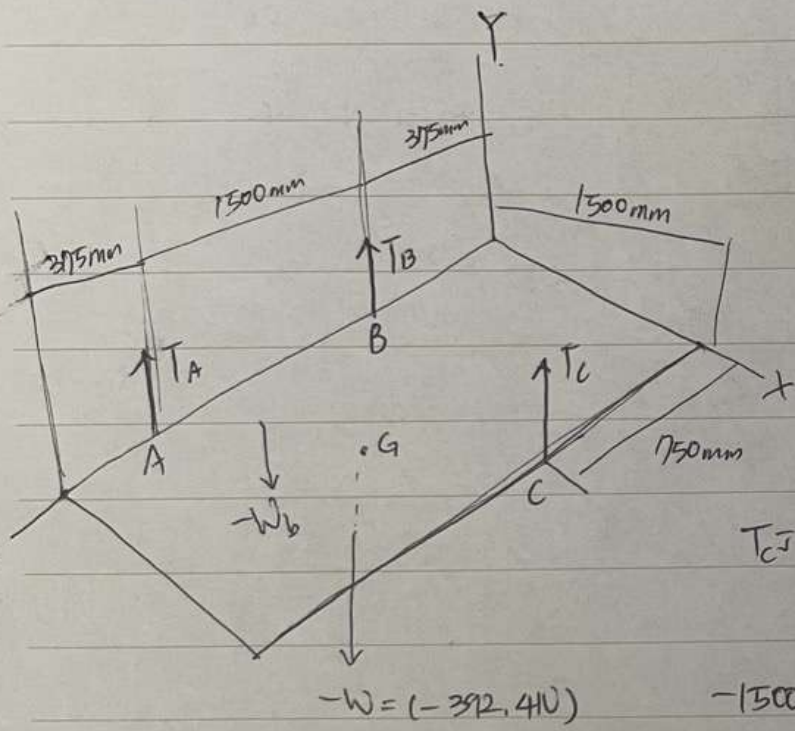


<비판 4.97>



3A형 플레이트의 무게는 392.4N 일 때
각 줄의 장력을 구하라.



$$W = 40 \times 9.81 \text{ N} = 392.4 \text{ N}$$

$$\sum M_B = 0: r_{AB} \times T_A j + r_{CB} \times T_C j + r_{GB} \times (-392.4 \text{ N}) j = 0$$

$$(1500 \text{ mm}) k \times T_A j + [(1500 \text{ mm}) i + (3175 \text{ mm}) k] \times T_C j + [(1500 \text{ mm}) i + (1500 \text{ mm}) k] \times (-392.4 \text{ N}) j = 0$$

$$-1500 T_A i + 1500 T_C k - 3175 T_C i - 294300 k + 294300 j = 0$$

$$k: 1500 T_C - 294300 = 0 \quad T_C = 196.2 \text{ N}$$

$$i: -1500 T_A - 3175 (196.2) + 294300 = 0 \quad T_A = 147.15 \text{ N}$$

$$\sum F_y = 0: T_A + T_B + T_C - 392.4 \text{ N} = 0$$

$$147.15 \text{ N} + T_B + 196.2 - 392.4 = 0 \quad T_B = 49.05 \text{ N}$$