3) $2I + 2P = 5$ ①

$I + 3P = 6$ ②

$3I - P = 4$ ③

1. solve ② for I $\to$ $I = 6 - 3P$

   substitute into ③ $\to$ $3(6-3P) - P = 4$

   $18 - 9P - P = 4$

   $-10P = -14$

   $\boxed{P = 1.4}$

   substitute back into ② $\to$ $I = 6 - 3(\frac{14}{10})$

   $I = 6 - 4.2 = \boxed{1.8}$

   However, using $I = 1.8$ and $P = 1.4$ does not work in ①

   $\to 2(1.8) + 2(1.4) \neq 5$

   Using ① to solve would yield the same results as the one

2. $\min_{I,P} \max \{ |2I + 2P|, |I + 3P|, |3I - P| \}$ with the

   s.t. $-5 \le 2I + 2P \le 5$

   $-6 \le I + 3P \le 6$

   $4 \le 3I - P \le 4$

3. Constraints: $|2I + 2P| \le 7$

   $|I + 3P| \le 7$

   $|3I - P| \le 7$

4.