

Homework

1. Apply the Omega test algorithm to the following problems:

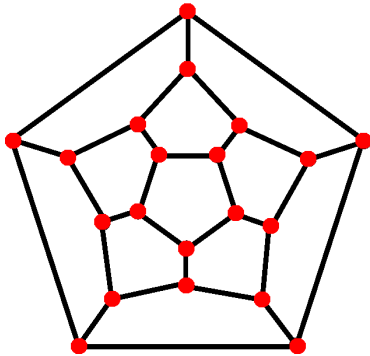
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$$\begin{aligned}z &\geq -x \\ y &\leq 10 - 8x \\ 8y &\leq 15 + x \\ 2z &= 3y + 1\end{aligned}$$

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$$\begin{aligned}6y &\geq 3x + 1 \\ 10y &\leq 5x + 2 \\ 2z &\geq 7x + y\end{aligned}$$

2. Solve the answer set exercise from the EVE lecture slides week 9.
3. Find a Hamiltonian Cycle in the planar graph of a dodecahedron using the encoding from EVE lecture with your favorite ASP solver.



4. Apply the Cooper's method to the problem: $\exists x.(2x < 3y + 2 \wedge z + y < x \wedge 7|4x + 3)$