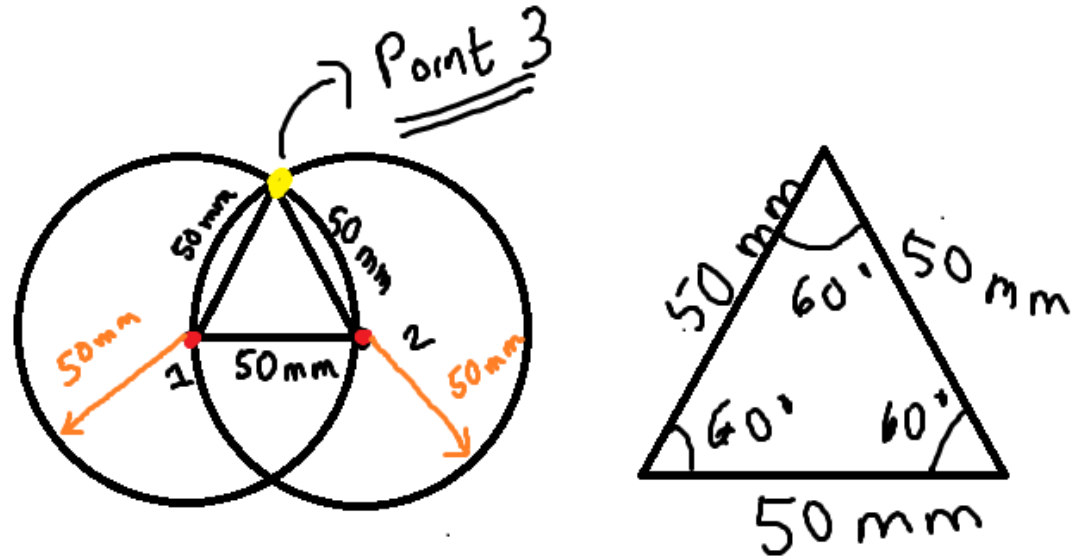
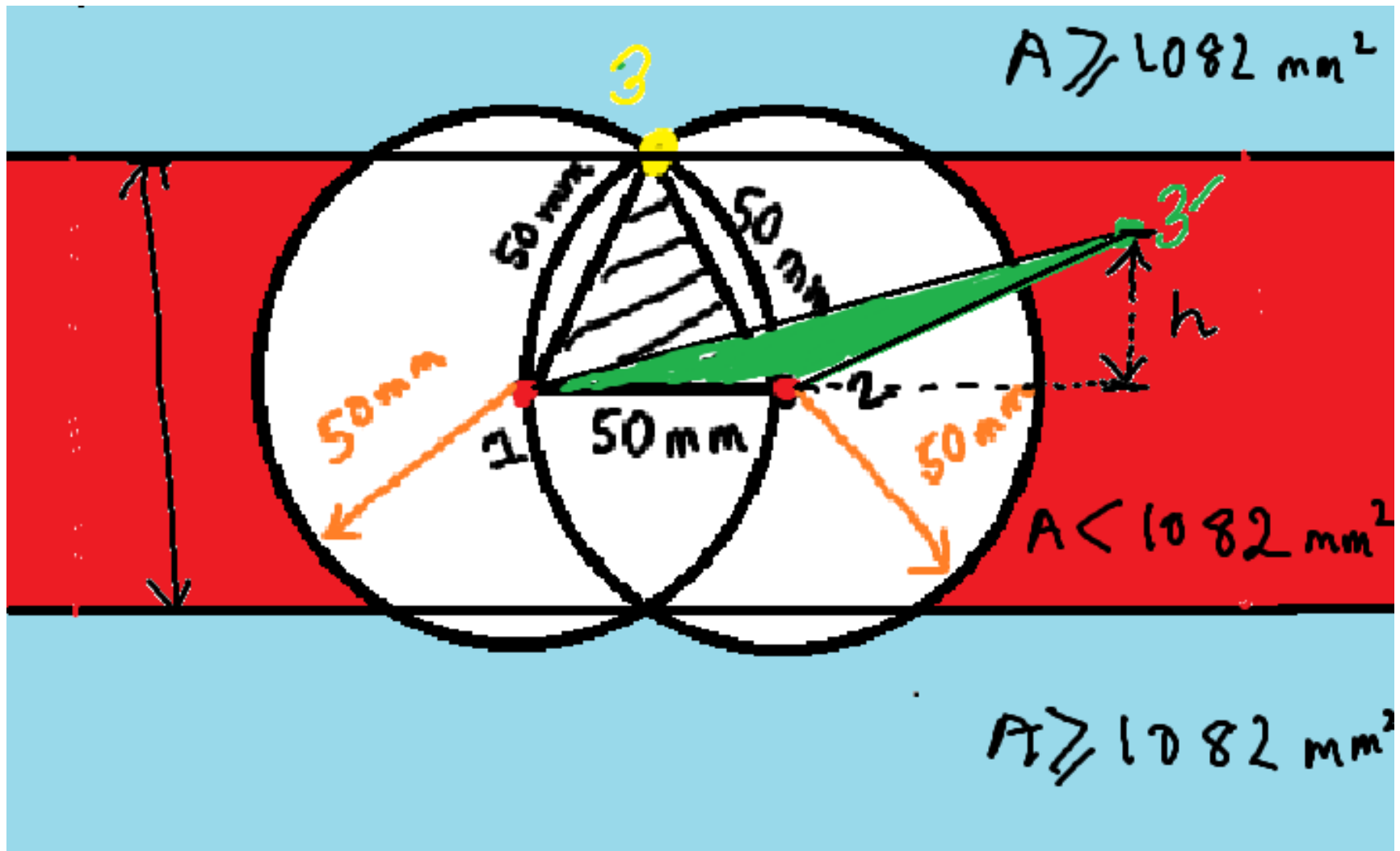


How does \_mindist relate to \_minarea ?



$$A_{\min} = \frac{1}{2} \times 50^2 \times \sin(60)$$

$$A_{\min} = 1082 \text{ mm}^2$$



Thus, to eliminate colinear-ish points, we MUST use a minimum Area of AT  
 LEAST  $\frac{1}{2} (\_mindist)^2 \sin(60)$

- This shows that `_minarea2` should be  $\geq 1,170,000$  for `_mindist=50 mm`, `_minarea $\geq$ 1082 mm2`
- This can be seen in EVT 17, 06, 08 where if we go below this `minarea` threshold some anomalous triplets are taken (seen by increased triplet count) that reduces accuracy of `pT`

```

** Mod(mindist=50, min area2=5000, ntriple found: 445)
Address          N nL nCln      P      pT      T0
-----
-1    0xe477890  23  3   20   47.174  27.069  658.597
-----
I NSH  SHID  Flags  Pl Pn L  S      x      y
-----
      2  5402 00000000  5  2  0  26   417.302  237.214 -1:
** Mod (mindist=50, minarea2= 5 x 10^6)(ntriple: 444)
d->printHelixSeedCollection("TTheLixFinder:Negative", 1,")
-----
HelID  Address      N nL nCln      P      pT      T0
-----
-1    0xe477630  23  3   20   47.457  27.015  658.594
-----
I NSH  SHID  Flags  Pl Pn L  S      x      y
-----
      2  5402 00000000  5  2  0  26   417.302  237.214 -1:
      1  6436 00000000  6  2  0  36   508.385  188.115 -9

```