Contents

1 Basic

1.1 .vimrc

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2 Math

2.1 Euclidean's Algorithm

2.2 Big Integer



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|-----------------------------------|---------------------------------|--|--|
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| | | | |
| 3 Data Structure 3.1 Disjoint Set | | | |
| | 3.3 Copy on Write Segement Tree | | |
| 3.2 Segement Tree with Lazy Tag | | | |

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| | 3.5 Rope | |
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| 3.4 Persistent Segement Tree | | |
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 $3.6 ext{ pb_ds}$

| std::priority_queue pairing_heap_tag binary_heap_tag binomial_heap_tag | $ \begin{array}{c} \operatorname{push} \\ \lg(n) \\ 1 \\ \lg(n) \\ 1 \end{array} $ | $ \begin{array}{c c} \operatorname{pop} \\ \operatorname{lg}(n) \\ \operatorname{lg}(n) \\ \operatorname{lg}(n) \end{array} $ | $ \begin{array}{c} \text{modify} \\ n \lg(n) \\ \lg(n) \\ n \\ \lg(n) \end{array} $ | $\begin{array}{c} \operatorname{erase} \\ n \lg(n) \\ \lg(n) \\ n \\ \lg(n) \end{array}$ | $ \begin{array}{c c} \text{join} \\ n \lg(n) \\ 1 \\ n \\ \lg(n) \end{array} $ |
|--|--|---|---|--|--|
| binomial_heap_tag | $\lg(n)$ | $\lg(n)$ | $\lg(n)$ | $\lg(n)$ | $\lg(n)$ |
| rc_binomial_heap_tag thin_heap_tag | 1 | $\lg(n)$ $\lg(n)$ | $\lg(n) \ \lg(n)[\mathrm{ps}]$ | $\lg(n)$ $\lg(n)$ | |

ps: 1 if increased_key only else $\lg(n)$

4 graph

4.1 Dijkstra's Algorithm

4.2 Tarjan's Algorithm

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| 5.2 MaxFlow (ISAP) | | |
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| 5.3 | ${ m MinCostMaxFlow}$ | | |
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| 5.4 | ${\bf Bounded Max Flow}$ | | |
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