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| MATH TOPICS | LEARNED | TEMPLATE | SOLVED PROBLEM |
| Probability and Expected value  (programming Camp syllabus)\* |  |  |  |
| Count Inversions |  |  |  |
| Koenig’s Theorem |  |  |  |
| Permutation,Combination |  |  |  |
| Finding n –th permutation |  |  |  |
| Matrix operations ( all covered) (programming Camp syllabus)\* |  |  |  |
| Counting ( all covered ) (programming Camp syllabus)\* |  |  |  |
| Polynomials  (programming Camp syllabus)\* |  |  |  |
| Group Theory  (programming Camp syllabus)\* |  |  |  |
| Permutation cycles  (programming Camp syllabus)\* |  |  |  |
| Special numbers  (programming Camp syllabus)\* |  |  |  |
| Joseph Problem (Using queue n^2) |  |  |  |
| Joseph Problem (Using recursion n) |  |  |  |
| Finding k-th number from a sequence of unsorted numbers in log(n) |  |  |  |
| Basic: Set, Complex Number, Real Number, Polynomial, Binomial Coefficients, Induction Principle,Series Sum,conversion |  |  |  |