Results for MINMAX_3 (mTSP) Keld Helsgaun, November 19, 2017

| Instance | LKH-3 |
|-----------|---------|
| a280 | 968 |
| ali535 | 69913 |
| att48 | 4636 |
| att532 | 9938 |
| bayg29 | 663 |
| bays29 | 838 |
| berlin52 | 3070 |
| bier127 | 41758 |
| brazil58 | 12347 |
| brd14051 | 158053 |
| brg180 | 680 |
| burma14 | 1932 |
| ch130 | 2217 |
| ch150 | 2402 |
| d198 | 9186 |
| d493 | 14834 |
| d657 | 18720 |
| d1291 | 19534 |
| d1655 | 23833 |
| d2103 | 29350 |
| d15112 | 527254 |
| d18512 | 216872 |
| dantzig42 | 381 |
| dsj1000 | 6422653 |
| eil51 | 159 |
| eil76 | 193 |
| eil101 | 224 |
| fl417 | 5071 |
| fl1400 | 7795 |
| fl1577 | 8415 |
| fl3795 | 11162 |
| fnl4461 | 61712 |
| fri26 | 478 |
| gil262 | 883 |
| gr17 | 1260 |
| gr21 | 1442 |
| gr24 | 643 |
| gr48 | 2015 |
| gr96 | 22482 |
| gr120 | 2556 |
| gr137 | 33652 |
| | |

| gr202 | 16161 |
|-----------------|----------|
| gr229 | 49471 |
| gr431 | 62826 |
| gr666 | 101532 |
| hk48 | 4645 |
| kroA100 | 8040 |
| kroB100 | 8482 |
| kroC100 | 7945 |
| kroD100 | 8507 |
| kroE100 | 8918 |
| kroA150 | 9611 |
| kroB150 | 9503 |
| kroA200 | 10687 |
| kroB200 | 10687 |
| lin105 | 6960 |
| lin318 | 15660 |
| linhp318 | 15041 |
| nrw1379 | 19199 |
| p654 | 15515 |
| pa561 | 941 |
| pcb442 | 17418 |
| pcb1173 | 19613 |
| pcb3038 | 46850 |
| pla7397 | 8073036 |
| pla33810 | 22404404 |
| pla85900 | 48329856 |
| pr76 | 44775 |
| pr107 | 24715 |
| pr124 | 26103 |
| pr136 | 37661 |
| pr144 | 28119 |
| pr152 | 37107 |
| pr226 | 38466 |
| pr264 | 22876 |
| pr299 | 19137 |
| pr439 | 39067 |
| pr1002 | 91320 |
| pr2392 | 130469 |
| rat99 | 516 |
| rat195 | 880 |
| rat575 | 2346 |
| rat783 | 3051 |
| rd100 | 3031 |
| rd400 rl1304 | 5227 |
| | 85954 |
| 1 1 1 1 1 1 1 | 02/11 |
| rl1323 | 92411 |

| rl1889 | 110365 |
|-----------|---------|
| rl5915 | 193280 |
| rl5934 | 193389 |
| rl11849 | 313809 |
| si175 | 7394 |
| si535 | 16523 |
| si1032 | 31423 |
| st70 | 281 |
| swiss42 | 509 |
| ts225 | 46759 |
| tsp225 | 1507 |
| u159 | 16869 |
| u574 | 13109 |
| u724 | 14573 |
| u1060 | 77041 |
| u1432 | 51888 |
| u1817 | 19659 |
| u2152 | 22025 |
| u2319 | 78409 |
| ulysses16 | 4628 |
| ulysses22 | 4628 |
| usa13509 | 6759355 |
| vm1084 | 81524 |
| vm1748 | 114675 |