

THE SUBGROUP LATTICE OF A_5

THOMAS CONNOR AND DIMITRI LEEMANS

| Nr. | Structure | Order | Length | Maximal Subgroups | Minimal Overgroups |
|-----|-----------|-------|--------|----------------------|-----------------------|
| 1 | A_5 | 60 | 1 | 2 (5), 3 (6), 4 (10) | |
| 2 | A_4 | 12 | 5 | 6, 7 (4) | 1 |
| 3 | D_{10} | 10 | 6 | 5, 8 (5) | 1 |
| 4 | S_3 | 6 | 10 | 7, 8 (3) | 1 |
| 5 | 5 | 5 | 6 | 9 | 3 |
| 6 | 2^2 | 4 | 5 | 8 (3) | 2 |
| 7 | 3 | 3 | 10 | 9 | 2 (2), 4 |
| 8 | 2 | 2 | 15 | 9 | 3 (2), 4 (2), 6 |
| 9 | 1 | 1 | 1 | | 5 (6), 7 (10), 8 (15) |

TABLE 1. Subgroup lattice of A_5

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