The group G is isomorphic to the group labelled by [336, 114] in the Small Groups library. Ordinary character table of $G \cong SL(2,7)$:

| | 1a | 3a | 7a | 7b | 4a | 6a | 8a | 8b | 14a | 14b | 2a |
|-------------|----|----|-----------------------------|-----------------------------|----|----|------------------|------------------|----------------------------|----------------------------|----|
| χ_1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| χ_2 | 3 | 0 | $E(7) + E(7)^2 + E(7)^4$ | $E(7)^3 + E(7)^5 + E(7)^6$ | -1 | 0 | 1 | 1 | $E(7) + E(7)^2 + E(7)^4$ | $E(7)^3 + E(7)^5 + E(7)^6$ | 3 |
| χ_3 | 3 | 0 | $E(7)^3 + E(7)^5 + E(7)^6$ | $E(7) + E(7)^2 + E(7)^4$ | -1 | 0 | 1 | 1 | $E(7)^3 + E(7)^5 + E(7)^6$ | $E(7) + E(7)^2 + E(7)^4$ | 3 |
| χ_4 | 4 | 1 | $-E(7) - E(7)^2 - E(7)^4$ | $-E(7)^3 - E(7)^5 - E(7)^6$ | 0 | -1 | 0 | 0 | $E(7) + E(7)^2 + E(7)^4$ | $E(7)^3 + E(7)^5 + E(7)^6$ | -4 |
| χ_5 | 4 | 1 | $-E(7)^3 - E(7)^5 - E(7)^6$ | $-E(7) - E(7)^2 - E(7)^4$ | 0 | -1 | 0 | 0 | $E(7)^3 + E(7)^5 + E(7)^6$ | $E(7) + E(7)^2 + E(7)^4$ | -4 |
| χ_6 | 6 | 0 | -1 | -1 | 2 | 0 | 0 | 0 | -1 | -1 | 6 |
| χ_7 | 6 | 0 | -1 | -1 | 0 | 0 | $-E(8) + E(8)^3$ | $E(8) - E(8)^3$ | 1 | 1 | -6 |
| χ_8 | 6 | 0 | -1 | -1 | 0 | 0 | $E(8) - E(8)^3$ | $-E(8) + E(8)^3$ | 1 | 1 | -6 |
| χ_9 | 7 | 1 | 0 | 0 | -1 | 1 | -1 | -1 | 0 | 0 | 7 |
| χ_{10} | 8 | -1 | 1 | 1 | 0 | -1 | 0 | 0 | 1 | 1 | 8 |
| χ_{11} | 8 | -1 | 1 | 1 | 0 | 1 | 0 | 0 | -1 | -1 | -8 |

Trivial source character table of $G \cong SL(2.7)$ at p=2:

| Trivial source character table of $G = SL(2,t)$ at $p = 2$. | | | | | | | | | | | |
|--|---|--|---------------------------------------|---|---|-------|--------|---------------------|-------------|--|--|
| Normalisers N_i | N_1 | | | N_2 | | N_3 | N_4 | N_5 | N_6 N_7 | | |
| p-subgroups of G up to conjugacy in G | P_1 | | | P_2 | | P_3 | P_4 | P_5 | P_6 P_7 | | |
| Representatives $n_j \in N_i$ 1a 3 | 7a | 7b | 1a 3a | 7a | 7b | 1a 1 | a = 3a | $\overline{1a 3a}$ | 1a 1a | | |
| $1 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 1 \cdot \chi_4 + 1 \cdot \chi_5 + 0 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 1 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} $ | 2 | 2 | 0 0 | 0 | 0 | 0 (| 0 0 | 0 0 | 0 0 | | |
| $ \left \begin{array}{c} 0 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 0 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 0 \cdot \chi_9 + 1 \cdot \chi_{10} + 1 \cdot \chi_{11} \end{array} \right 16 - C \left(\frac{1}{2} \right) $ | 2 | 2 | 0 0 | 0 | 0 | 0 0 |) 0 | 0 0 | 0 0 | | |
| $\left[\begin{array}{cccccccccccccccccccccccccccccccccccc$ | | | | 0 | 0 | 0 0 |) 0 | 0 0 | 0 0 | | |
| $ \left \begin{array}{c} 0 \cdot \chi_1 + 1 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 1 \cdot \chi_5 + 1 \cdot \chi_6 + 1 \cdot \chi_7 + 1 \cdot \chi_8 + 1 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} \end{array} \right 32 $ | $4 * E(7) + 4 * E(7)^{2} + 2 * E(7)^{3} + 4 * E(7)^{4} + 2 * E(7)^{5} + 2 * E(7)^{6}$ | 6 2 * $E(7)$ + 2 * $E(7)^{2}$ + 4 * $E(7)^{3}$ + 2 * $E(7)^{4}$ + 4 * $E(7)^{5}$ + 4 * $E(7)^{6}$ | 0 0 | 0 | 0 | 0 0 |) 0 | 0 0 | 0 0 | | |
| $0 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 0 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 0 \cdot \chi_9 + 1 \cdot \chi_{10} + 0 \cdot \chi_{11} = 8$ | 1 | 1 | 8 -1 | 1 | 1 | 0 (| 0 0 | | 0 0 | | |
| $ \left 0 \cdot \chi_1 + 0 \cdot \chi_2 + 1 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 1 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 1 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} \right $ | $E(7) + E(7)^2 + 2 * E(7)^3 + E(7)^4 + 2 * E(7)^5 + 2 * E(7)^6$ | $2 * E(7) + 2 * E(7)^{2} + E(7)^{3} + 2 * E(7)^{4} + E(7)^{5} + E(7)^{6}$ | | $E(7) + E(7)^2 + 2 * E(7)^3 + E(7)^4 + 2 * E(7)^5 + 2 * E(7)^6$ | | |) 0 | 0 0 | 0 0 | | |
| $0 \cdot \chi_1 + 1 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 1 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 1 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11}$ 16 | $2 * E(7) + 2 * E(7)^{2} + E(7)^{3} + 2 * E(7)^{4} + E(7)^{5} + E(7)^{6}$ | $E(7) + E(7)^2 + 2 * E(7)^3 + E(7)^4 + 2 * E(7)^5 + 2 * E(7)^6$ | 16 1 | $2 * E(7) + 2 * E(7)^{2} + E(7)^{3} + 2 * E(7)^{4} + E(7)^{5} + E(7)^{6}$ | $E(7) + E(7)^2 + 2 * E(7)^3 + E(7)^4 + 2 * E(7)^5 + 2 * E(7)^6$ | 0 0 |) 0 | 0 0 | 0 0 | | |
| $1 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 0 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 1 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} $ 8 | 1 | 1 | 8 2 | 1 | 1 | 0 0 |) 0 | 0 0 | 0 0 | | |
| $1 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 2 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 1 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} $ | -1 | -1 | 20 2 | -1 | -1 | 4 (| 0 0 | 0 0 | 0 0 | | |
| $1 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 1 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 1 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} $ | 0 | 0 | 14 2 | 0 | 0 | 2 2 | 2 2 | 0 0 | 0 0 | | |
| $ \left \ 0 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 1 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 0 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} \ \right \ 6 $ | -1 | -1 | 6 0 | -1 | -1 | 2 2 | 2 -1 | 0 0 | 0 0 | | |
| $1 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 1 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 1 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} $ | 0 | 0 | 14 2 | 0 | 0 | 2 (|) 0 | 2 2 | 0 0 | | |
| $ \left \begin{array}{c} 0 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 1 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 0 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} \end{array} \right 6 $ | -1 | -1 | $\begin{vmatrix} 6 & 0 \end{vmatrix}$ | -1 | -1 | 2 0 |) 0 | 2 -1 | 0 0 | | |
| $1 \cdot \chi_1 + 1 \cdot \chi_2 + 1 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 2 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 1 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} $ 26 | -2 | -2 | 26 2 | -2 | -2 | 2 (| 0 0 | 0 0 | 2 0 | | |
| $1 \cdot \chi_1 + 0 \cdot \chi_2 + 0 \cdot \chi_3 + 0 \cdot \chi_4 + 0 \cdot \chi_5 + 0 \cdot \chi_6 + 0 \cdot \chi_7 + 0 \cdot \chi_8 + 0 \cdot \chi_9 + 0 \cdot \chi_{10} + 0 \cdot \chi_{11} $ | 1 | 1 | 1 1 | 1 | 1 | 1 : | 1 1 | 1 1 | 1 1 | | |

 $P_1 = Group([()]) \cong 1$

 $P_2 = Group([(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16)]) \cong C2$

 $P_3 = Group([(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16),(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13)]) \cong C4$

 $P_4 = Group([(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16),(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13),(1,10,4,9)(2,7,3,5)(6,15,8,13)(11,16,12,14)]) \cong \mathbb{Q}8$

 $P_5 = Group([(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16),(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13),(1,2,4,3)(5,13,7,15)(6,16,8,14)(9,11,10,12)]) \cong \mathbb{Q}8$

 $P_6 = Group([(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16),(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13),(1,12,6,5,4,11,8,7)(2,15,14,10,3,13,16,9)]) \cong \mathbb{C}8$

 $P_7 = Group([(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16),(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13),(1,10,4,9)(2,7,3,5)(6,15,8,13)(11,16,12,14),(1,2,4,3)(5,13,7,15)(6,16,8,14)(9,11,10,12)]) \cong Q16$

 $N_1 = Group([(1, 2, 4, 3)(5, 9, 7, 10)(6, 11, 8, 12)(13, 16, 15, 14), (2, 5, 6)(3, 7, 8)(9, 13, 14)(10, 15, 16)]) \cong SL(2,7)$

 $N_2 = Group([(1, 2, 4, 3)(5, 9, 7, 10)(6, 11, 8, 12)(13, 16, 15, 14), (2, 5, 6)(3, 7, 8)(9, 13, 14)(10, 15, 16)]) \cong SL(2,7)$

 $N_3 = Group([(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13),(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16),(1,2,4,3)(5,13,7,15)(6,16,8,14)(9,11,10,12),(1,5,8,12,4,7,6,11)(2,10,16,15,3,9,14,13)]) \cong Q16$

 $N_4 = Group([(1,10,4,9)(2,7,3,5)(6,15,8,13)(11,16,12,14),(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13),(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16),(5,12,14)(6,9,13)(7,11,16)(8,10,15),(1,2,4,3)(5,6,7,8)(9,16,10,14)(11,15,12,13)]) \\ \cong C2 \cdot S4 = SL(2,3) \cdot C2 \cdot S4 = SL(2,3) \cdot$

 $N_5 = Group([(1,2,4,3)(5,13,7,15)(6,16,8,14)(9,11,10,12),(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13),(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16),(2,14,6)(3,16,8)(5,13,12)(7,15,11),(1,5,2,13,4,7,3,15)(6,10,16,12,8,9,14,11)]) \cong C2 . S4 = SL(2,3) . C2$

 $N_6 = Group([(1,12,6,5,4,11,8,7)(2,15,14,10,3,13,16,9),(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13),(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16),(1,2,4,3)(5,13,7,15)(6,16,8,14)(9,11,10,12)]) \cong Q16$

 $N_7 = Group([(1,2,4,3)(5,13,7,15)(6,16,8,14)(9,11,10,12),(1,10,4,9)(2,7,3,5)(6,15,8,13)(11,16,12,14),(1,6,4,8)(2,14,3,16)(5,11,7,12)(9,15,10,13),(1,4)(2,3)(5,7)(6,8)(9,10)(11,12)(13,15)(14,16)]) \cong Q16$