NUMBERS THEORY:

$$P_{1,11} = (P \cup \{1\}) \backslash \{2,3,5,7\}$$

Q - SET OF ALL NUMBERS THAT HAVE AT LEAST TWO PRIME FACTORS, NONE OF WHICH ARE 2,3,5 OR 7, AND THE NUMBER 1.

NATURAL NUMBERS N :

$$N = \{2^{N\{0\}}\} X \{3^{N\{0\}}\} X \{5^{N\{0\}}\} X \{7^{N\{0\}}\} X P_{1,11} X Q$$

$$N = \{1,2,3,4,5\} \cup 6N \cup (12N \pm \{1,2,3,4,5\})$$

$$N_2 = \{4\} \cup 6N \cup (12N \pm \{2,4\})$$

$$(N_2 \cup \{2\}) = \{2\} X \{2^{N\{0\}}\} X \{3^{N\{0\}}\} X \{5^{N\{0\}}\} X \{7^{N\{0\}}\} X P_{1,11} X Q$$

$$N_3 = (12N \pm \{3\})$$

$$(N_3 \cup \{3\}) = \{3\} X \{3^{N\{0\}}\} X \{5^{N\{0\}}\} X \{7^{N\{0\}}\} X P_{1,11} X Q$$

$$N_5 = (30N \pm \{5\})$$

$$(N_5 \cup \{5\}) = \{5\} X \{5^{N\{0\}}\} X \{7^{N\{0\}}\} X P_{1,11} X Q$$

$$N_7 = (42N \pm \{7\}) \setminus N_5$$

$$(N_7 \cup \{7\}) = \{7\} X \{7^{N\{0\}}\} X P_{1,11} X Q$$

$$(P_{1,11} \cup Q) \backslash \{1\} = (6N \pm \{1\}) = (12N \pm \{1,5\}) = (24N \pm \{1,5,7,11\}) \setminus N_5 \setminus N_7$$

$$(P_{1,11} \cup Q) = P_{1,11} X Q$$

$$Q = (24N \pm \{1,5,7,11\}) X (24N \pm \{1,5,7,11\}) \setminus N_5 \setminus N_7$$

$$P_{1,11} = (24N \pm \{1,5,7,11\}) \setminus Q \setminus N_5 \setminus N_7$$

$$P = \{2,3,5,7\} \cup (24N \pm \{1,5,7,11\}) \backslash$$

$$\backslash [(24N \pm \{1,5,7,11\}) X (24N \pm \{1,5,7,11\})] \backslash (30N \pm \{5\}) \backslash (42N \pm \{7\})$$

$$N = \{2,3,5,7\} \cup N_2 \cup N_3 \cup N_5 \cup N_7 \cup P_{1,11} \cup Q$$