MATHEMATICS OF COMPUTATION
VOLUME 47, NUMBER 175
JULY 1986, PAGES 361-368

Computation of All the Amicable Pairs Below 10^{10}

By H. J. J. te Riele

Abstract. An efficient exhaustive numerical search method for amicable pairs is described. With the aid of this method all 1427 amicable pairs with smaller member below 10^{10} have been computed, more than 800 pairs being new. This extends previous exhaustive work below 10^8 by H. Cohen. In three appendices (contained in the supplements section of this issue), various statistics are given, including an ordered list of all the gcd's of the 1427 amicable pairs below 10^{10} (which may be useful in further amicable pair research). Suggested by the numerical results, a theorem of Borho and Hoffmann for constructing APs has been extended.

1. Introduction. Let $\sigma(m)$ denote the sum of all the divisors of m, including 1 and m. An *amicable* pair (AP) is a pair of positive integers (m, n), $m < n$, such that $\sigma(m) = \sigma(n) = m + n$. We note that m is *abundant* (since $\sigma(m) > 2m$) and that n is *deficient* (since $\sigma(n) < 2n$). The smallest AP is

$$(220, 284) = (2^2 5.11, 2^2 71).$$

In order to check whether or not a given positive integer m is the smaller member of an amicable pair, it seems necessary, at first sight, to compute $\sigma(m)$ and $n := \sigma(m) - m$, to check whether $n > m$ (i.e., whether m is abundant), and, if so, to compute $\sigma(n)$ and compare $\sigma(m)$ with $\sigma(n)$. This involves one or two complete factorizations, in case m is deficient or abundant, respectively. However, a closer look reveals that it is often possible to find out whether a given number m is deficient (hence cannot be the smaller member of an AP) without the need to factorize it completely. Moreover, once $\sigma(m)$ and n $(= \sigma(m) - m)$ have been computed, it is often possible to discover that $\sigma(n) \neq \sigma(m)$ without the need to factorize n completely.

These considerations have guided the design of an efficient exhaustive numerical AP search algorithm, the details of which are given in Section 2. With the aid of this algorithm we have extended Cohen's exhaustive list of all 236 APs with smaller member below 10^8 [4] to all 1427 APs with smaller member below 10^{10}. Of these, 601 have been published earlier [6], [7]. The other 826 seem to be new, and are published here for the first time (9 of them have been communicated to the author already in 1983 and 1984 by Woods (2), Borho (2) and Lee (5)). Section 3 presents details of the computations together with several tables collected from this search. Moreover, a result of Borho and Hoffmann for constructing APs is extended, as was suggested by the numerical tables.

Received March 27, 1985.
1980 *Mathematics Subject Classification*. Primary 10A40; Secondary 10-04.
Key words and phrases. Amicable pair.

Three appendices to this paper appear in the supplements section of this issue. These may also be obtained by writing to the author.

In Appendix I, we present the complete list of all 1427 APs with smaller member below 10^{10} ordered according to the size of the smaller members of the pairs. Appendix II displays the same list with a different ordering, viz., according to the various occurring types (defined in Section 3). Finally, Appendix III tabulates all the greatest common divisors of the 1427 APs, in increasing order, together with their frequencies of occurrence, and, for each gcd g, the rank numbers of all the APs (m, n) for which $\gcd(m, n) = g$.

2. Check Whether a Given m is the Smaller Member of an AP. Let p_i be the ith prime, $P_{ij} := \prod_{k=i}^{i+j-1} p_k$, $Q_{ij} := \prod_{k=i}^{i+j-1} p_k/(p_k - 1)$. We start with the following lemma which gives an upper bound for $\sigma(m)/m$.

LEMMA 2.1. *If m only has prime divisors $\geqslant p_i$ $(i \geqslant 1)$ and if $m < P_{i,j+1}$ $(j \geqslant 1)$ then $\sigma(m)/m < Q_{ij}$.*

Proof. Since $m < P_{i,j+1} = p_i p_{i+1} \cdots p_{i+j}$, and since any prime divisor of m is $\geqslant p_i$, it follows that m has at most j different prime divisors $\geqslant p_i$ (otherwise we would have $m \geqslant p_i p_{i+1} \cdots p_{i+j} = P_{i,j+1}$). This implies that

$$\frac{\sigma(m)}{m} = \prod_{p^e \| m} \frac{p^{e+1} - 1}{p^e(p-1)} = \prod_{p^e \| m} \frac{p - p^{-e}}{p - 1} < \prod_{p | m} \frac{p}{p-1} \leqslant \prod_{k=i}^{i+j-1} \frac{p_k}{p_k - 1} = Q_{ij}. \quad \square$$

In the algorithm below, this lemma is invoked very frequently. Therefore, we require a precomputed table of P- and Q-values, large enough so that the values needed can be found quickly by simple table look-ups.

Now we describe an efficient algorithm to check whether a given positive integer m belongs to an AP (m, n) with $m < n$. This algorithm is based on the observation that when, for given γ and N, we want to verify one of the relations $\sigma(N)/N > \gamma$, $= \gamma$, $< \gamma$, and when the primes $2, 3, \ldots, p$ have been tried as divisors of N, it may be possible

(i) to detect, with Lemma 2.1, whether $\sigma(N)/N < \gamma$ by using the information that the *unfactored* portion of N only has prime divisors $> p$, and

(ii) to detect whether $\sigma(N)/N > \gamma$ by using the *factored* portion of N.

In this way, much unnecessary factorization time may be avoided. The price to pay for this gain lies in the time needed to consult the P- and Q-tables used in Lemma 2.1. In the algorithm, the index $i_{\max}$ is the maximum value of i for which Lemma 2.1 is invoked. In order to restrict this table look-up time, $i_{\max}$ should not be chosen too large. The optimal value of $i_{\max}$ also depends on the actual implementation of the algorithm (cf. Section 3).

Algorithm to Check Whether m is the Smaller Member of an AP.

Step 1. (Find out whether m is abundant; in this step, keep $m = m_1 m_2$ where $\gcd(m_1, m_2) = 1$, m_1 is the factored and m_2 is the unfactored portion of m, $\alpha := \sigma(m_1)/m_1$; start with $m_1 := 1$, $m_2 := m$, $\alpha := 1$.)

Start factoring m by trial dividing m_2 by the primes $p_1, p_2, \ldots \leqslant m_2^{1/2}$. In case a prime power divisor p_{i-1}^e $(e \geqslant 1)$ of m_2 has been found, update m_1, m_2 and α $(m_1 := m_1 p_{i-1}^e, m_2 := m/m_1, \alpha := \alpha \cdot \sigma(p_{i-1}^e)/p_{i-1}^e)$. After the trial division with p_{i-1} (whether or not p_{i-1} divides m_2): if $\alpha < 2$ and $4 \leqslant i \leqslant i_{\max}$, check whether m

is possibly deficient as follows: by inspecting the P-table find the smallest value of j $(=:j^*)$ such that $m_2 < P_{i,j+1}$; if $\alpha Q_{i,j^*} < 2$, then STOP (because, in that case, m is deficient: by Lemma 2.1 we have $\sigma(m_2)/m_2 < Q_{i,j^*}$ so that

$$\frac{\sigma(m)}{m} = \frac{\sigma(m_1)}{m_1} \cdot \frac{\sigma(m_2)}{m_2} = \alpha \frac{\sigma(m_2)}{m_2} < \alpha Q_{i,j^*} < 2).$$

If $\alpha \geqslant 2$, or $i < 4$ or $i > i_{\max}$, the deficiency check on m is left out. After the complete factorization of m (and simultaneous computation of $\sigma(m)$): if $m < \sigma(m) - m =: n$ (i.e., m is abundant), go to Step 2, otherwise STOP.

End of Step 1

Step 2. (Given m, $\sigma(m)$ and $n = \sigma(m) - m$, check whether $\sigma(n) = \sigma(m)$; during the factorization of n try to exclude those m for which $\sigma(n) \neq \sigma(m)$ as early as possible by testing whether $\sigma(n)/n \neq \beta$ where $\beta = \sigma(m)/n$; in this step, keep $n = n_1 n_2$, where $\gcd(n_1, n_2) = 1$, n_1 is the factored and n_2 the unfactored portion of n, $\alpha := \sigma(n_1)/n_1$; start with $n_1 := 1$, $n_2 := n$, $\alpha := 1$.)

Start factoring n by trial dividing n_2 by the primes $p_1, p_2, \ldots \leqslant n_2^{1/2}$. In case a prime power divisor p_{i-1}^e $(e \geqslant 1)$ of n_2 has been found, update n_1, n_2 and α: if the updated α satisfies $\alpha > \beta$, then STOP (because, in that case, we have

$$\frac{\sigma(n)}{n} = \frac{\sigma(n_1)}{n_1} \frac{\sigma(n_2)}{n_2} \geqslant \frac{\sigma(n_1)}{n_1} = \alpha > \beta = \frac{\sigma(m)}{n},$$

so that $\sigma(n) \neq \sigma(m)$). After the trial division with p_{i-1} (whether or not p_{i-1} divides n_2): if $4 \leqslant i \leqslant i_{\max}$ check whether $\sigma(n)/n < \beta$ as follows: by inspecting the P-table find the smallest value of j $(=:j^*)$ such that $n_2 < P_{i,j+1}$. If $\alpha Q_{i,j^*} < \beta$, then STOP (because, in that case, $\sigma(n)/n < \beta$: by Lemma 2.1 we have $\sigma(n_2)/n_2 < Q_{i,j^*}$ so that

$$\frac{\sigma(n)}{n} = \frac{\sigma(n_1)}{n_1} \cdot \frac{\sigma(n_2)}{n_2} = \alpha \frac{\sigma(n_2)}{n_2} < \alpha Q_{i,j^*} < \beta).$$

If $i < 4$ or $i > i_{\max}$, the check on $\sigma(n)/n < \beta$ is omitted. After the complete factorization of n (and simultaneous computation of $\sigma(n)$): check whether $\sigma(n) = \sigma(m)$. If so, (m, n) is an AP.

End of Step 2

3. Computing All the APs Below 10^{10}. In order to compute all the APs (m, n) with $m < n$ and $10^8 < m \leqslant 10^{10}$ (thus extending H. Cohen's computations reported in [4]), we distinguish between $m \equiv 0 \pmod 6$ (the easy case), and $m \not\equiv 0 \pmod 6$ (the hard case).

If $m \equiv 0 \pmod 6$ and $n = \sigma(m) - m$ is *even*, then (m, n) cannot be an AP [5]. Therefore, n should be *odd*. In that case, we have [6] $m = 2^\mu M^2$, $n = N^2$, with $\mu \in \mathbb{N}$, M and N being odd. For all the numbers $m = 2^\mu M^2$ with $3 | M$ and $10^8 < m \leqslant 10^{10}$, we computed $n := \sigma(m) - m$ and checked whether n was a perfect square. Not a single such case was found. Computer time was about 6 CPU seconds.

For all $m \not\equiv 0 \pmod 6$ with $10^8 < m \leqslant 10^{10}$ we used the algorithm of Section 2 to find all APs in this range. The optimal choice of $i_{\max}$ for our FORTRAN-implementation on a CYBER 750 was about 75. This value was chosen to be fixed for the whole range. The speed-up factor of our program was about 15, compared with a straightforward program which, given m, computes $\sigma(m)$ and, if $n := \sigma(m) - m > m$, computes $\sigma(n)$. A slight increase of the speed was obtained as follows. In Step 1, in case a prime (power) factor of m_2 was found and m_1 and $\sigma(m_1)$ (among others) were updated, it was checked whether *both* m_1 *and* $\sigma(m_1)$ were divisible by one of the primitive abundant numbers $20 = 2^2 5$, $28 = 2^2 7$, $70 = 2.5.7$ and $88 = 2^3 11$. If so, the algorithm was stopped since this implied that also m and $\sigma(m)$, hence also $n = \sigma(m) - m$ were divisible by this abundant number, so that both m and n were abundant. This is impossible for an AP (m, n).

The total time to cover the range $10^8 < m \leqslant 10^{10}$ was about 1000 (low priority) CPU hours, spent in the last seven months of 1984.

The total number of APs (m, n) found with $m < n$ and $10^8 < m \leqslant 10^{10}$ was 1191. In Appendix I (of the supplements section) all the APs with smaller member $\leqslant 10^{10}$ are given (including the 236 APs with smaller member $\leqslant 10^8$). For each pair we list the decimal representation and the prime factorization of the members, a rank number, a code (letter plus digit) referring to the discoverer, and the type of the pair (defined below). For example, pair #1427 reads as follows:

1427	9967523980	2E2.257.5.17.37.3083
R9 42	12890541236	2E2.257.107.117191.

Table 1 gives the meaning of the codes, and their frequencies of occurrence. Extensive information about the sources of the pairs with code L1 is given in the survey paper [6].

There are 1015 pairs with even members and 412 with odd members. The minimal and maximal values of m/n are 0.6979 and 0.999858 for the APs #567 and #1010, respectively.

Let $A(x)$ be the number of APs (m, n) with $m < n$ and $m \leqslant x$. From the list of APs with $m \leqslant 10^8$, Bratley et al. [3] concluded that for $x \leqslant 10^8$, $A(x)$ is approximately proportional to $x^{1/2}/\ln(x)$. In Table 2 we give, for $x = k.\,10^9$ $(1 \leqslant k \leqslant 10)$: $A(x)$, $A(x)\ln(x)/x^{1/2}$, $A(x)(\ln(x))^2/x^{1/2}$ and $A(x)(\ln(x))^3/x^{1/2}$. From these figures we may draw the conclusion that for $x \leqslant 10^{10}$, $A(x)$ is approximately proportional to $x^{1/2}/(\ln(x))^3$.

TABLE 1

Status list of the first 1427 *APs* (m, n), $m < n$, *with* $m \leqslant 10^{10}$

code	#APs	references and remarks
L1	508	[6]
R2	1	[9] (#1056)
W1	73	sent to the author by D. Woods on June 29, 1982 and published in [7]
R3	19	found by the author with the methods described in [8], and published in [7]
W2	1	sent in by D. Woods on Feb. 16, 1983 (#330)
R6	1	found by the author in May, 1983 (#1375)
W3	1	sent in by D. Woods on July 11, 1983 (#1050)
L2	5	sent in by E. J. Lee in July, 1984 (# #778, 860, 894, 1241, 1261)
B4	2	sent in by W. Borho on Nov. 2, 1984 (# #809, 1393)
R9	816	found by the author during the systematic search described in this paper

TABLE 2

Comparison of $A(x)$ *with* $x^{1/2}/(\ln(x))^i$, $i = 1, 2, 3$

$x/10^9$	$A(x)$	$A(x)\ln(x)/x^{1/2}$	$A(x)(\ln(x))^2/x^{1/2}$	$A(x)(\ln(x))^3/x^{1/2}$
1	586	0.3840	7.958	164.9
2	762	0.3649	7.815	167.4
3	898	0.3578	7.807	170.4
4	1009	0.3527	7.799	172.4
5	1100	0.3474	7.759	173.3
6	1185	0.3444	7.755	174.6
7	1256	0.3403	7.715	174.9
8	1317	0.3358	7.656	174.6
9	1377	0.3327	7.625	174.8
10	1427	0.3286	7.566	174.2

We define an AP (m, n), $m < n$, to be a *regular amicable pair of type* (i, j), if $(m, n) = (gM, gN)$, where $g = \gcd(m, n)$, $\gcd(g, M) = \gcd(g, N) = 1$, M and N are squarefree, and the numbers of prime factors of M and N are i and j, respectively. Other pairs are called *irregular* or *exotic*. There are 1082 regular and 345 irregular APs with smaller member $\leqslant 10^{10}$. It is easy to see that there are no regular pairs of type $(1, j)$, $j \geqslant 1$: let g be the gcd of such an AP, so that $(m, n) = (gp, gN)$ where p is a prime and $\gcd(g, p) = \gcd(g, N) = 1$. We have $m < n$, hence $p < N$. By definition, $\sigma(gp) = \sigma(gN)$, implying that $p + 1 = \sigma(N)$. Since, for any $N \in \mathbb{N}$, $\sigma(N) > N$, this implies that $p + 1 > N$, a contradiction. We note that in this argument N need not be squarefree.

In Table 3 we give the frequency distribution of the various types among the first 1082 regular APs. We note that there are relatively few regular APs of type $(i, 1)$, $i \geqslant 2$, and of type (i, j) with $i < j$.

In [7] the total number of known APs with smaller member $\leqslant 10^{10}$ was 601 (these are the APs belonging to the first four codes in Table 1). Among them were 104 irregular APs, i.e., 17.3%. Comparing this figure with the 345 irregular APs in our *complete* list of APs with smaller member $\leqslant 10^{10}$, i.e., 24.2%, we see that relatively many irregular APs were found in our systematic search.

In Appendix II (of the supplements section) we present lists of all the 1082 regular APs arranged according to their types, together with a list of the 345 exotic APs. This appendix may be useful for searches of APs of a special type.

The regular pairs of type $(i, 1)$, $i \geqslant 2$, play an important role as "mother" pairs in methods to generate new APs from given pairs. In [8] a substantial part of the new APs found there was constructed from such mother pairs. In [1], Borho and Hoffmann have partially generalized the methods from [8] by introducing the concept of a *breeder*: a breeder is a pair of positive integers (a_1, a_2) such that the equations

$$a_1 + a_2 x = \sigma(a_1) = \sigma(a_2)(x + 1)$$

TABLE 3

Frequency distribution of the first 1082 *regular APs of type* (i, j), $i \geqslant 2$, $j \geqslant 1$

$i =$	$j =$ 1	2	3	4	5	row totals
2	20	67	21	4	0	112
3	16	271	280	24	0	591
4	1	78	201	63	2	345
5	0	6	18	7	3	34
column totals	37	422	520	98	5	1082

have a positive integer solution x. If x is a prime, then (a_1, a_2x) is an amicable pair. For certain breeders, called "special" breeders, Borho and Hoffmann formulate the following

THEOREM 1 [1]. *Let* (a_1, a_2) *be a special breeder, i.e.,* $a_1 = au$, $a_2 = a$, *with* $\gcd(a, u) = 1$. *Take any factorization of* $C := \sigma(u)(u + \sigma(u) - 1)$ *into two different factors* D_1, D_2 $(C = D_1D_2)$. *Then, if the numbers* $s_i = D_i + \sigma(u) - 1$, *for* $i = 1, 2$, *and also* $q = u + s_1 + s_2$ *are primes not dividing* a, *then* $(auq,\ as_1s_2)$ *is an amicable pair.* □

Regular APs of type $(i, 1)$, $i \geqslant 2$, are of the form (au, ap), p prime, and the numbers (au, a) are special breeders which generally produce many APs with the above theorem.

In our list of 1427 APs we found a few APs, e.g., #647 and #955, which suggested that the condition $\gcd(a, u) = 1$ in Theorem 1 may be dropped. In fact, we have

THEOREM 2. *Let* (au, a) *be a breeder, i.e., there exists a positive integer* x *such that* $au + ax = \sigma(au) = \sigma(a)(x + 1)$. *Take any factorization of* $C := (x + 1)(x + u)$ *into two different factors* D_1, D_2 $(C = D_1D_2)$. *Then, if the numbers* $s_i = D_i + x$, *for* $i = 1, 2$, *and also* $q = u + s_1 + s_2$ *are primes not dividing* a, *then* $(auq,\ as_1s_2)$ *is an amicable pair.* □

The proof of this theorem is left to the reader.

If $\gcd(a, u) = 1$, then $\sigma(au) = \sigma(a)\sigma(u)$, so that $x = \sigma(u) - 1$ and Theorem 2 reduces to Theorem 1. As an example, AP #955 gives the breeder (au, a) with $a = 3.5.7.19$ and $u = 7.29.47.181$. Theorem 2 yields 16 new APs with this breeder as input.

It is known [5] that most even APs have a pair sum which is $\equiv 0 \pmod 9$. Our search proves that indeed Poulet's pair #503: $(2^4 331.19.6619, 2^4 331.199.661)$ is the smallest exceptional pair. All known exceptional pairs had members $\equiv 7 \pmod 9$ and a pair sum $\equiv 5 \pmod 9$. In our search, we found two even APs with pair sum $\equiv 3 \pmod 9$, viz., the (irregular) pairs:

$$\#577: 2^4\begin{cases} 19^2 103.1627 \\ 3847.16763 \end{cases} \quad \text{and} \quad \#874: 2^2 19\begin{cases} 13^2 37.43.139 \\ 41.151.6709. \end{cases}$$

TABLE 4

The 17 *APs among the first* 1427, *whose pair sum is* $\not\equiv 0 \pmod 9$

	even members	odd members
regular	#503, type (2,2) #1031, type (2,2) #1081, type (2,2)	#899, type (3,2) #1057, type (2,2) #1158, type (3,2)
irregular	##577, 874	##7, 38, 78, 113, 256, 440, 1083, 1175, 1380

TABLE 5

All (37) *pairs from the first* 1427 *APs having the same pair sum*

rank numbers		pair sum	prime decomposition of the pair sum, i.e., exponents belonging to the primes 2	3	5	7	11	13	17	19	23	29	31	37
32	35	1296000	7	4	3									
105	109	20528640	9	6	1		1							
137	138	37739520	10	4	1	1		1						
172	173	75479040	11	4	1	1		1						
272	276	321408000	10	4	3								1	
282	286	348364800	13	5	2	1								
350	351	556839360	6	6	1	1	1						1	
347	355	579156480	9	5	1	2				1				
373	375	638668800	12	4	2	1	1							
368	377	661893120	12	5	1	1				1				
395	399	761177088	10	5		1				1	1			
411	415	796340160	6	5	1	2	1			1				
427	433	883872000	8	4	3		1						1	
462	476	1181174400	7	5	2	2							1	
486	491	1282417920	8	5	1	1				1			1	
574	582	2068416000	9	5	3	1				1				
626	630	2395008000	10	5	3	1	1							
653	665	2682408960	12	5	1	2	1							
695	697	3155023872	11	4		1	1	1		1				
717	730	3599769600	13	4	2	1							1	
751	753	4049740800	10	6	2	1							1	
798	807	4606156800	13	3	2	2			1					
786	787	4716601344	13	2		1		1		1				1
824	840	5094835200	10	7	2	1		1						
940	941	6824563200	9	3	2	2		1					1	
926	952	6897623040	13	7	1	1	1							
997	998	7925299200	11	5	2	2		1						
1012	1019	8273664000	11	5	3	1				1				
1069	1097	10027929600	12	5	2			1					1	
1124	1142	11195712000	9	3	3		1			1			1	
1147	1150	11416204800	9	4	2	1	2	1						
1143	1181	12098211840	12	5	1		1	1	1					
1232	1233	13473008640	10	5	1	2		1	1					
1254	1265	14341017600	12	4	2	1		1		1				
1249	1255	14478912000	9	5	3	2				1				
1272	1278	15058068480	10	5	1	2		1		1				
1410	1425	19926466560	14	5	1	1	1	1						

These are the first two examples of APs of the form described in [5, Theorem I, case (b)] (also cf. the remarks immediately following Table I in [5]). Table 4 gives the rank numbers of the 17 APs with smaller member $\leqslant 10^{10}$ whose pair sum is $\not\equiv 0 \pmod 9$, divided into even and odd pairs, and regular and irregular pairs.

Another question, suggested by Professor C. Pomerance, is whether pairs, triples, quadruples, etc. of APs exist having the *same pair sum*. Among the first 1427 APs, we found 37 such pairs of APs, but no such triples, quadruples, etc. Table 5 gives the rank numbers of these pairs of APs, and the prime factorization of their pair sums. The pair sums only have prime divisors $\leqslant 37$. In 30 of the 37 cases at least one member of the pair was found during the exhaustive search described in the present paper.

In Appendix III (of the supplements section) we tabulate all the greatest common divisors of the first 1427 APs, ordered according to their size, with frequencies, and with the rank numbers of all the APs corresponding to a given gcd. This might be useful in further searches for special APs, and in searches for so-called *isotopic* APs (cf., [6, p. 83]). For example, new APs, isotopic with APs from the list of 1427 APs, are obtained by replacing the common factor $3^3 5$ in ##882 and 1087 by $3^2 7.13$, by replacing the common factor $3^3 5^3$ in #1205 by $3^2 5^2 31$, and by replacing the common factor $3^3 5^2 31$ in ##717 and 1228 by $3^6 5.23.137.547.1093$, and by $3^{10} 5.23.107.3851$.

In [8], we have presented methods to find new APs from known APs. By applying these methods to the new APs among the first 1427 APs, we have found 117 new APs (with smaller member $> 10^{10}$). The new APs were found mainly from mother pairs having a relatively simple structure, like those of type $(i, 1)$, $i > 1$. They will be published in a forthcoming report [2], together with many other new amicable pairs.

Centre for Mathematics and Computer Science
Kruislaan 413
1098 SJ Amsterdam
The Netherlands

1. W. BORHO & H. HOFFMANN, "Breeding amicable numbers in abundance," *Math. Comp.*, v. 46, 1986, pp. 281–293.

2. W. BORHO, H. HOFFMANN & H. J. J. TE RIELE, *Table of Amicable Pairs Between* 10^{10} *and* 10^{52}, CWI-report. (In preparation.)

3. P. BRATLEY, F. LUNNON & JOHN MCKAY, "Amicable numbers and their distribution," *Math. Comp.*, v. 24, 1970, pp. 431–432.

4. H. COHEN, "On amicable and sociable numbers," *Math. Comp.*, v. 24, 1970, pp. 423–429.

5. E. J. LEE, "On divisibility by nine of the sums of even amicable pairs," *Math. Comp.*, v. 23, 1969, pp. 545–548.

6. E. J. LEE & J. S. MADACHY, "The history and discovery of amicable numbers," *J. Recreational Math.*, v. 5, 1972; Part I: pp. 77–93, Part II: pp. 153–173, Part III: pp. 231–249.

7. H. J. J. TE RIELE, *Table of* 1869 *New Amicable Pairs Generated from* 1575 *Mother Pairs*, Report NN 27/82, Math. Centre, Amsterdam, Oct. 1982.

8. H. J. J. TE RIELE, "On generating new amicable pairs from given amicable pairs," *Math. Comp.*, v. 42, 1984, pp. 219–223.

9. H. J. J. TE RIELE, *Further Results on Unitary Aliquot Sequences*, Report NW 2/78, Math. Centre, Amsterdam, 2nd ed., Jan. 1978.

MATHEMATICS OF COMPUTATION
VOLUME 47, NUMBER 175
JULY 1986, PAGES S9–S40

Supplement to
Computation of All the Amicable Pairs Below 10^{10}

By H. J. J. te Riele

Appendix I

The first 1427 APs

```
    1 220 2E2.5.11    3D
L1 21 284 2E2.71
    2 1184 2E5.37
L1 X  1210 2.5.11E2
    3 2620 2E2.5.131
L1 22 2924 2E2.17.43
    4 5020 2E2.5.251
L1 22 5564 2E2.13.107
    5 6232 2E3.19.41
L1 X  6368 2E5.199
    6 10744 2E3.17.79
L1 22 10856 2E3.23.59
    7 12285 3E3.5.7.13
L1 X  14595 3.5.7.139
    8 17296 2E4.23.47
L1 21 18416 2E4.1151
    9 63020 2E2.23.5.137
L1 21 76084 2E2.23.827
   10 66928 2E4.47.89
L1 22 66992 2E4.53.79
   11 67095 3E3.5.7.71
L1 22 71145 3E3.5.17.31
   12 69615 3E2.7.13.5.17
L1 21 87633 3E2.7.13.107
   13 79750 2.5E3.11.29
L1 X  88730 2.5.19.467
   14 100485 3E2.5.7.11.29
L1 32 124155 3E2.5.31.89
   15 122265 3E2.5.13.11.19
L1 21 139815 3E2.5.13.239
   16 122368 2E9.239
L1 X  123152 2E4.43.179
   17 141664 2E5.19.233
L1 X  153176 2E3.41.467
   18 142310 2.5.7.19.107
L1 32 168730 2.5.47.359
   19 171856 2E4.23.467
L1 22 176336 2E4.103.107
   20 176272 2E4.23.479
L1 22 180848 2E4.89.127
   21 185368 2E3.17.29.47
L1 32 203432 2E3.59.431
   22 196724 2E2.11.17.263
L1 22 202444 2E2.11.43.107
   23 280540 2E2.5.13E2.83
L1 X  365084 2E2.107.853
   24 308620 2E2.5.13.1187
L1 32 389924 2E2.43.2267
   25 319550 2.7.5E2.11.83
L1 X  430402 2.7.71.433
   26 356408 2E3.13.23.149
L1 32 399592 2E3.199.251
   27 437456 2E4.19.1439
L1 22 455344 2E4.149.191
   28 469028 2E2.7E2.2393
L1 X  486178 2.7E2.11E2.41
   29 503056 2E4.23.1367
L1 22 514736 2E4.53.607
   30 522405 3E2.5.13.19.47
L1 22 525915 3E2.5.13.29.31
```

```
   31 600392 2E3.13.23.251   6D
L1 32 669688 2E3.97.863
   32 609928 2E3.11.29.239
L1 32 686072 2E3.191.449
   33 624184 2E3.11.41.173
L1 32 691256 2E3.71.1217
   34 635624 2E3.11.31.233
L1 32 712216 2E3.127.701
   35 643336 2E3.29.47.59
L1 32 652664 2E3.17.4799
   36 667964 2E2.11.17.19.47
L1 43 783556 2E2.31.71.89
   37 726104 2E3.17.19.281
L1 32 796696 2E3.53.1879
   38 802725 3.5E2.7.11.139
L1 X  863835 3.5.7.19.433
   39 879712 2E5.37.743
L1 X  901424 2E4.53.1063
   40 898216 2E3.11.59.173
L1 32 980984 2E3.47.2609
   41  947835 3E3.5.7.17.59
L1 32 1125765 3E3.5.31.269
   42  998104 2E3.17.41.179
L1 32 1043096 2E3.23.5669
   43 1077890 2.5.11.41.239
L1 33 1099390 2.5.17.29.223
   44 1154450 2.5E2.11.2099
L1 22 1189150 2.5E2.17.1399
   45 1156870 2.5.11.13.809
L1 32 1292570 2.5.19.6803
   46 1175265 3E2.7E2.13.5.41
L1 21 1438983 3E2.7E2.13.251
   47 1185376 2E5.17.2179
L1 X  1286744 2E3.41.3923
   48 1280565 3E2.5.13.11.199
L1 22 1340235 3E2.5.13.29.79
   49 1328470 2.5.11.13.929
L1 X  1483850 2.5E2.59.503
   50 1358595 3E2.5.19.7.227
L1 22 1486845 3E2.5.19.37.47
   51 1392368 2E4.17.5119
L1 22 1464592 2E4.239.383
   52 1466150 2.5E2.7.59.71
L1 X  1747930 2.5.47.3719
   53 1468324 2E2.11.13.17.151
L1 43 1749212 2E2.37.53.223
   54 1511930 2.5.7.21599
L1 23 1598470 2.5.19.47.179
   55 1669910 2.5.11.17.19.47
L1 42 2062570 2.5.239.863
   56 1798875 3E3.5E3.13.41
L1 X  1870245 3E2.5.13.23.139
   57 2082464 2E5.59.1103
L1 22 2090656 2E5.79.827
   58 2236570 2.5.7.89.359
L1 33 2429030 2.5.23.59.179
   59 2652728 2E3.13.23.1109
L1 32 2941672 2E3.71.5179
   60 2723792 2E4.37.43.107
L1 32 2874064 2E4.263.683
```


0025-5718/86 $1.00 + $.25 per page

```
      61 2728726 2.7.11.13.29.47     7D
L1 43 3077354 2.7.19.23.503
      62 2739704 2E3.11.163.191
L1 32 2928136 2E3.31.11807
      63 2802416 2E4.17.10303
L1 22 2947216 2E4.167.1103
      64 2803580 2E2.5.13.41.263
L1 42 3716164 2E2.503.1847
      65 3276856 2E3.11.23.1619
L1 32 3721544 2E3.647.719
      66 3606850 2.5E2.31.13.179
L1 X  3892670 2.5.31.29.433
      67 3786904 2E3.11.23.1871
L1 32 4300136 2E3.467.1151
      68 3805264 2E4.29.59.139
L1 32 4006736 2E4.179.1399
      69 4238984 2E3.17.71.439
L1 33 4314616 2E3.23.131.179
      70 4246130 2.5.7.60659
L1 23 4488910 2.5.23.29.673
      71 4259750 2.5E3.11.1549
L1 X  4445050 2.5E2.19.4679
      72 4482765 3E2.5.19.7E2.107
L1 X  5120595 3E2.5.19.53.113
      73 4532710 2.7.5.13.17.293
L1 42 6135962 2.7.71.6173
      74 4604776 2E3.11E2.67.71
L1 X  5162744 2E3.113.5711
      75 5123090 2.5.7.163.449
L1 33 5504110 2.5.19.59.491
      76 5147032 2E3.11.23.2543
L1 32 5843048 2E3.383.1907
      77 5232010 2.7.5.41.1823
L1 X  5799542 2.7E2.23.31.83
      78 5357625 3.7.13.5E3.157
L1 X  5684679 3E2.7.13.11.631
      79 5385310 2.5.7.107.719
L1 33 5812130 2.5.17.179.191
      80 5459176 2E3.17.137.293
L1 X  5495264 2E5.83.2069
      81 5726072 2E3.11.31.2099
L1 32 6369928 2E3.79.10079
      82 5730615 3E3.5.11.17.227
L1 33 6088905 3E3.5.23.37.53
      83 5864660 2E2.5.17.47.367
L1 42 7489324 2E2.53.35327
      84 6329416 2E3.23.41.839
L1 33 6371384 2E3.19.167.251
      85 6377175 3E2.5E2.7.4049
L1 22 6680025 3E2.5E2.11.2699
      86 6955216 2E4.19.137.167
L1 31 7418864 2E4.463679
      87 6993610 2.5.13.23.2339
L1 22 7158710 2.5.13.53.1039
      88 7275532 2E2.11.37.41.109
L1 X  7471508 2E2.11E2.43.359
      89 7288930 2.11.5.23.43.67
L1 43 8221598 2.11.7.197.271
      90 7489112 2E3.17.53.1039
L1 33 7674088 2E3.23.179.233
```

```
      91 7577350 2.5E2.11.23.599     7D
L1 32 8493050 2.5E2.59.2879
      92 7677248 2E6.139.863
L1 22 7684672 2E6.167.719
      93 7800544 2E5.43.5669
L1 X  7916696 2E3.17.58211
      94 7850512 2E4.37.89.149
L1 X  8052488 2E3.29.61.569
      95 8262136 2E3.17.79.769
L1 33 8369864 2E3.29.43.839
      96 8619765 3.5.11.7.17.439
L1 33 9627915 3.5.11.23.43.59
      97  8666860 2E2.5.23.83.227
L1 43 10638356 2E2.47.71.797
      98  8754130 2.5.7.11.11369
L1 32 10893230 2.5.757.1439
      99  8826070 2.5.11.19.41.103
L1 43 10043690 2.5.31.179.181
     100 9071685 3E2.5.31.7.929
L1 22 9498555 3E2.5.31.11.619
     101 9199496 2E3.29.19.2087
L1 22 9592504 2E3.29.173.239
     102  9206925 3.5E2.7.13.19.71
L1 X  10791795 3.5.7.79.1301
     103 9339704 2E3.11.211.503
L1 33 9892936 2E3.47.83.317
     104 9363584 2E7.191.383
L1 21 9437056 2E7.73727
     105  9478910 2.5.7.19.7127
L1 33 11049730 2.5.71.79.197
     106  9491625 3E2.5E3.13.11.59
L1 X  10950615 3E2.5.13.18719
     107  9660950 2.5E2.13.89.167
L1 X  10025290 2.5.11.91139
     108  9773505 3E2.5.7.19.23.71
L1 43 11791935 3E2.5.31.79.107
     109 10254970 2.5.11.53.1759
L1 22 10273670 2.5.11.59.1583
     110 10533296 2E4.19.34649
L1 X  10949704 2E3.29.109.433
     111 10572550 2.5E2.31.19.359
L1 22 10854650 2.5E2.31.47.149
     112 10596368 2E4.29.41.557
L1 X  11199112 2E3.53.61.433
     113 10634085 3E4.7.11E2.5.31
L1 X  14084763 3.7.11E2.23.241
     114 10992735 3E2.5.13.19.23.43
L1 32 12070305 3E2.5.13.47.439
     115 11173460 2E2.5.53.83.127
L1 43 13212076 2E2.31.47.2267
     116 11252648 2E3.11.71.1801
L1 33 12101272 2E3.67.107.211
     117 11498355 3E4.5.11.29.89
L1 21 12024045 3E4.5.11.2699
     118 11545616 2E4.19.163.233
L1 32 12247504 2E4.491.1559
     119 11693290 2.7.5.167047
L1 X  12361622 2.7E2.13.31.313
     120 11905504 2E5.13.28619
L1 X  13337336 2E3.107.15581
```

```
     121 12397552 2E4.23.59.571      8D
L1 32 13136528 2E4.359.2287
     122 12707704 2E3.17.41.43.53
L1 42 14236136 2E3.107.16631
     123 13671735 3.5.19.7E2.11.89
L1 X  15877065 3.5.19.17.29.113
     124 13813150 2.5E2.13.79.269
L1 33 14310050 2.5E2.29.71.139
     125 13921528 2E3.19.67.1367
L1 22 13985672 2E3.19.101.911
     126 14311688 2E3.17.47.2239
L1 33 14718712 2E3.23.167.479
     127 14426230 2.7.5.13.83.191
L1 43 18087818 2.7.31.71.587
     128 14443730 2.5.7E3.4211
L1 X  15882670 2.5.19.179.467
     129 14654150 2.5E2.7.149.281
L1 32 16817050 2.5E2.179.1879
     130 15002464 2E5.37.12671
L1 22 15334304 2E5.227.2111
     131 15363832 2E3.11.71.2459
L1 33 16517768 2E3.53.163.239
     132 15938055 3E2.5.7.19.2663
L1 33 17308665 3E2.5.11.73.479
     133 16137628 2E2.13.23.103.131
L1 33 16150628 2E2.13.31.43.233
     134 16871582 2.7E2.19.13.17.41
L1 32 19325698 2.7E2.19.97.107
     135 17041010 2.7.5.31.7853
L1 33 19150222 2.7.13.43.2447
     136 17257695 3.5.7.13.47.269
L1 33 17578785 3.5.7.23.29.251
     137 17754165 3E2.5.13.11.31.89
L1 32 19985355 3E2.5.13.127.269
     138 17844255 3E2.5.13.11.47.59
L1 32 19895265 3E2.5.13.71.479
     139 17908064 2E5.53.10559
L1 22 18017056 2E5.79.7127
     140 18056312 2E3.17.103.1289
L1 33 18166888 2E3.19.107.1117
     141 18194715 3E2.5.7.11.59.89
L1 43 22240485 3E2.5.31.107.149
     142 18655744 2E9.83.439
L1 X  19154336 2E5.619.967
     143 20014808 2E3.11.79.2879
L1 33 21457192 2E3.47.149.383
     144 20022328 2E3.17.23.37.173
L1 42 22823432 2E3.1367.2087
     145 20308995 3E3.5.7.21491
L1 23 20955645 3E3.5.17.23.397
     146 21448630 2.5.7.131.2339
L1 33 23030090 2.5.19.53.2287
     147 22227075 3E3.5E2.13.17.149
L1 32 24644925 3E3.5E2.29.1259
     148 22249552 2E4.13.41.2609
L1 X  25325528 2E3.587.5393
     149 22508145 3E3.5.11.23.659
L1 22 23111055 3E3.5.11.79.197
     150 22608632 2E3.19.23.29.223
L1 42 25775368 2E3.1439.2239
```

```
     151 23358248 2E3.37.23.47.73    8D
L1 31 25233112 2E3.37.85247
     152 23389695 3E3.5.7.53.467
L1 33 25132545 3E3.5.17.47.233
     153 23628940 2E2.5.37E2.863
L1 X  27428276 2E2.17.251.1607
     154 24472180 2E2.5.17.167.431
L1 43 30395276 2E2.47.107.1511
     155 25596544 2E7.311.643
L1 X  25640096 2E5.67.11959
     156 25966832 2E4.29.191.293
L1 32 26529808 2E4.47.35279
     157 26090325 3E2.5E2.17.19.359
L1 33 26138475 3E2.5E2.11.59.179
     158 28118032 2E4.47.139.269
L1 33 28128368 2E4.59.83.359
     159 28608424 2E3.13.139.1979
L1 33 29603576 2E3.23.349.461
     160 30724694 2.7.13.11.103.149
L1 32 32174506 2.7.13.17.10399
     161 30830696 2E3.13.521.569
L1 X  31652704 2E5.449.2203
     162 31536855 3E2.5.7.53.1889
L1 21 32148585 3E2.5.7.102059
     163 31818952 2E3.11.41.8819
L1 33 34860248 2E3.97.167.269
     164 32205616 2E4.17.167.709
L1 31 34352624 2E4.2147039
     165 32642324 2E2.11.13.149.383
L1 44 35095276 2E2.17.47.79.139
     166 32685250 2.5E3.13.89.113
L1 X  34538270 2.5.13.379.701
     167 33501825 3E2.5E2.7.89.239
L1 33 36136575 3E2.5E2.19.79.107
     168 34256222 2.7.11.13.71.241
L1 32 35997346 2.7.11.23.10163
     169 34364912 2E4.43.199.251
L1 33 34380688 2E4.47.131.349
     170 34765731 3E2.7.13.11.17.227
L1 33 36939357 3E2.7.13.23.37.53
     171 35115795 3E3.5.11.13.17.107
L1 42 43266285 3E3.5.53.6047
     172 35361326 2.7.13.11.17.1039
L1 32 40117714 2.7.13.53.4159
     173 35373195 3E2.5.13.11.23.239
L1 32 40105845 3E2.5.13.179.383
     174 35390008 2E3.19.23.53.191
L1 42 39259592 2E3.71.69119
     175 35472592 2E4.43.47.1097
L1 32 36415664 2E4.53.42943
     176 37363095 3E2.7.11.5.41.263
L1 32 45663849 3E2.7.11.131.503
     177 37784810 2.7.5.539783
L1 24 39944086 2.7.13.41.53.101
     178 37848915 3E2.5.13.23.29.97
L1 32 39202605 3E2.5.13.19.3527
     179 38400512 2E9.179.419
L1 X  38938288 2E4.83.109.269
     180 38637016 2E3.11.359.1223
L1 33 40678184 2E3.29.271.647
```

```
181 38663950 2.5E2.13.17.3499    8D
L1 32 43362050 2.5E2.59.14699
182 38783992 2E3.13.37.10079
L1 33 41654408 2E3.47.139.797
183 38807968 2E5.37.73.449
L1 X  40912232 2E3.37.89.1553
184 43096904 2E3.17.41.59.131
L1 43 46715896 2E3.53.239.461
185 44139856 2E4.29.251.379
L1 33 44916944 2E4.83.149.227
186 45263384 2E3.17.59.5641
L1 33 46137016 2E3.19.433.701
187 46237730 2.7.5.11E2.53.103
L1 X  61319902 2.7.83.113.467
188 46271745 3E2.5.13.19.23.181
L1 X  49125375 3E2.5E3.13.3359
189 46521405 3E3.5.7.19.2591
L1 33 53011395 3E3.5.31.53.239
190 46555250 2.5E3.7.37.719
L1 X  55880590 2.5.103.227.239
191 46991890 2.5.29.11.14731
L1 X  48471470 2.5.29.19E2.463
192 48639032 2E3.13.29.16127
L1 33 52967368 2E3.59.293.383
193 48641584 2E4.29.104831
L1 23 48852176 2E4.47.167.389
194 49215166 2.31.61.7.11.13E2
L1 X  55349570 2.31.61.5.2927
195 50997596 2E2.13.19.71.727
L1 33 51737764 2E2.13.23.181.239
196 52695376 2E4.17.151.1283
L1 31 56208368 2E4.3513023
197 56055872 2E6.79.11087
L1 22 56598208 2E6.383.2309
198 56512610 2.7.5.11.23.3191
L1 X  75866014 2.7E2.774143
199 56924192 2E5.13.193.709
L1 X  64562488 2E3.283.28517
200 58580540 2E2.23.5.347.367
L1 32 70507972 2E2.23.521.1471
201 59497888 2E5.41.101.449
L1 X  61953512 2E3.29.97.2753
202 63560025 3E3.5E2.17.29.191
L1 33 65003175 3E3.5E2.23.53.79
203 63717615 3E2.5.13.17.43.149
L1 32 66011985 3E2.5.13.19.5939
204 66595130 2.5.31.7.30689
L1 22 74824390 2.5.31.59.4091
205 66854710 2.5.17.13E3.179
L1 X  71946890 2.5.17.83.5099
206 67729064 2E3.13.431.1511
L1 33 69439576 2E3.23.107.3527
207 67738268 2E2.19.13.17.37.109
L1 42 79732132 2E2.19.263.3989
208 68891992 2E3.13.23.83.347
L1 42 78437288 2E3.587.16703
209 71015260 2E2.5.23.263.587
L1 43 85458596 2E2.41.47.11087
210 71241830 2.5.11.19.89.383
L1 43 78057370 2.5.17.359.1279
```

```
211 72958556 2E2.11.19.197.443    8D
L1 33 74733604 2E2.11.53.73.439
212 73032872 2E3.11.71.11689
L1 33 78469528 2E3.59.83.2003
213 74055952 2E4.23.61.3299
L1 32 78166448 2E4.197.24799
214 74386305 3E2.5.7.17.29.479
L1 43 87354495 3E2.5.19.71.1439
215 74769345 3E3.5.7E2.89.127
L1 X  82824255 3E3.5.17.151.239
216 75171808 2E5.53.127.349
L1 32 77237792 2E5.479.5039
217 75226888 2E3.11.59.14489
L1 33 81265112 2E3.53.137.1399
218 78088504 2E3.13.31.53.457
L1 42 88110536 2E3.167.65951
219 78447010 2.5.17.19.149.163
L1 43 80960990 2.5.11.491.1499
220 79324875 3E2.5E3.7E2.1439
L1 X  87133365 3E2.5.11.103.1709
221 80422335 3E3.5.7.85103
L1 23 82977345 3E3.5.11.71.787
222  82633005 3E2.7.13.5.17.1187
L1 32 104177619 3E2.7.13.131.971
223 83135650 2.5E2.13.79.1619
L1 33 85603550 2.5E2.19.251.359
224  84521745 3E3.5.7.11.47.173
L1 42 107908335 3E3.5.383.2087
225 84591405 3E3.5.17.29.31.41
L1 43 89590995 3E3.5.13.71.719
226 86158220 2E2.5.41.105071
L1 33 99188788 2E2.23.43.25073
227  87998470 2.5.7.29.67.647
L1 43 102358010 2.5.47.89.2447
228  88144630 2.5.7E2.29.6203
L1 X  102814490 2.5.37.269.1033
229 89477984 2E5.59.83.571
L1 32 92143456 2E5.1637.1759
230 90437150 2.5E2.23.19.4139
L1 22 94372450 2.5E2.23.137.599
231 91996816 2E4.29.331.599
L1 33 93259184 2E4.79.89.829
232 93837808 2E4.19.83.3719
L1 32 99899792 2E4.1399.4463
233 95629904 2E4.67.37.2411
L1 22 97580944 2E4.67.227.401
234  95791430 2.7.17.5.101.797
L1 32 115187002 2.7.17.113.4283
235 96304845 3.5.7E2.13.10079
L1 23 96747315 3.5.7E2.23.59.97
236 97041735 3E2.5.7.71.4339
L1 22 97945785 3E2.5.7.239.1301
237 102023145 3E4.7E2.5.53.97
L1 32 116970399 3E4.7E2.13.2267
238 102719740 2E2.5.29E2.31.197
L1 X  129063812 2E2.43.431.1741
239 103034776 2E3.13.990719
L1 23 105016424 2E3.29.47.9631
240 104887448 2E3.19.71.9719
L1 33 105064552 2E3.23.47.12149
```

```
241 108734050 2.5E2.31.29.41.59    9D
L1 32 116251550 2.5E2.31.179.419
242 109410345 3E4.5.11.41.599
L1 22 110132055 3E4.5.11.59.419
243 110960710 2.5.67.7.59.401
L1 32 125222330 2.5.67.31.6029
244 114944072 2E3.17.19.44483
R3 33 125269528 2E3.53.439.673
245 115259625 3E3.5E3.13.37.71
R9 X  123757335 3E3.5.13.151.467
246 115447424 2E7.59.15287
L1 X  118458976 2E5.349.10607
247 115749344 2E5.47.76961
L1 X  116983744 2E6.431.4241
248 116654896 2E4.23.359.883
L1 33 120115664 2E4.101.239.311
249 118458830 2.7.5.37.45737
L1 X  131819506 2.7E2.13.107.967
250 120812175 3E3.5E2.11.53.307
R9 X  126671985 3E3.5.11.197.433
251 121293315 3E3.5.13.11.61.103
R9 X  138690045 3E2.5.13.383.619
252 127924335 3E2.5.7.11.36919
L1 X  148532625 3E2.5E3.31.4259
253 131118975 3E2.5E2.13.23.1949
R9 X  132926625 3E2.5E3.13.61.149
254 131483835 3E2.5.7.71.5879
L1 22 132692805 3E2.5.7.223.1889
255 133089500 2E2.5E3.23.71.163
R9 X  176374564 2E2.383.115127
256 133178325 3.5E2.7E3.31.167
L1 X  133471275 3.5E2.7.31.59.139
257 133768816 2E4.19.131.3359
L1 32 141213584 2E4.199.44351
258 134312152 2E3.13.127.10169
L1 33 139057448 2E3.23.223.3389
259 134886465 3E4.5.7E3.971
L1 X  147382335 3E4.5.19.107.179
260 136549413 3E2.7.11.13.23.659
L1 22 140207067 3E2.7.11.13.79.197
261 136770075 3E2.5E2.13.19.23.107
R9 X  155711205 3E2.5.13.179.1487
262 137424188 2E2.11.19.89.1847
R9 33 141993412 2E2.11.59.83.659
263 138605350 2.5E2.13E2.47.349
R9 X  147313850 2.5E2.23.128099
264 139009990 2.5.7.53.89.421
R3 43 156322490 2.5.23.179.3797
265 140744835 3E2.5.7.11.151.269
R9 43 166562685 3E2.5.17.239.911
266 140815384 2E3.19.23.47.857
R9 43 155709416 2E3.89.383.571
267 144788020 2E2.5.13.97.5741
R9 43 186088988 2E2.83.293.1913
268 145040288 2E5.41.227.487
L1 32 149364256 2E5.1063.4391
269 146648612 2E2.19.11E2.37.431
R9 X  159017308 2E2.19.23.90971
270 147366765 3E2.7E2.13.5.53.97
L1 31 182028483 3E2.7E2.13.31751
```

```
271 148077644 2E2.13.11.83.3119    9D
L1 32 160128436 2E2.13.47.65519
272 153015550 2.5E2.19.23.47.149
R9 43 168392450 2.5E2.79.89.479
273 154190750 2.7E2.5E3.41.307
R9 X  190889986 2.7E2.43.97.467
274 155578180 2E2.5.223.34883
R9 34 172610492 2E2.23.41.67.683
275 155797390 2.5.7.863.2579
L1 33 165195890 2.5.23.29.24767
276 156226856 2E3.31.23.61.449
L1 32 165181144 2E3.31.199.3347
277 157151410 2.5.13E3.23.311
R9 X  163634510 2.5.13.89.14143
278 161088158 2.7.11.17.37.1663
R9 55 166706530 2.5.23.31.103.227
279 162936904 2E3.13.719.2179
R9 33 166679096 2E3.19.839.1307
280 164733752 2E3.31.53.83.151
R9 43 166212808 2E3.17.383.3191
281 165323696 2E4.37.97.2879
R9 33 167155024 2E4.59.113.1567
282 165742395 3.5.7.13.29.53.79
R9 43 182622405 3.5.7.41.59.719
283 166737550 2.5E2.7.359.1327
R9 X  188953970 2.5.23.829.991
284 168930032 2E4.23.47.9767
L1 32 179904784 2E4.1583.7103
285 169000448 2E9.71.4649
L1 X  173499952 2E4.53.204599
286 169335790 2.5.13.19.179.383
L1 44 179029010 2.5.23.59.79.167
287 169652512 2E5.71.89.839
L1 32 173269088 2E5.191.28349
288 169884784 2E4.29.109.3359
R9 33 173843216 2E4.71.199.769
289 170566690 2.5.7.29.73.1151
R9 43 197704670 2.5.31.739.863
290 172271385 3E2.5.13.11.19.1409
L1 32 197261415 3E2.5.13.449.751
291 175032884 2E2.13.17.389.509
L1 21 175826716 2E2.13.17.198899
292 176632390 2.5.11.43.107.349
W1 32 182618810 2.5.11.719.2309
293 177997352 2E3.13.653.2621
L1 X  182108128 2E5.229.24851
294 180038452 2E2.11.19.31.6947
R9 44 193486028 2E2.23.29.47.1543
295 181088985 3.5.7.11.83.1889
R9 33 184694055 3.5.7.13.269.503
296 182702024 2E3.19.53.22679
L1 33 184713976 2E3.17.719.1889
297 183408615 3E2.5.13.19.29.569
L1 21 190055385 3E2.5.13.19.17099
298 186753688 2E3.11.41.191.271
L1 42 208059752 2E3.83.313343
299 186878110 2.5.17.19.47.1231
R9 44 196323170 2.5.23.41.109.191
300 189406984 2E3.13.71.113.227
R9 43 203592056 2E3.37.797.863
```

9D

301	190888155	3E2.5.17.19.23.571
R9 42	194594085	3E2.5.7.617759
302	195857415	3E2.5.13.19.67.263
R9 X	196214265	3E3.5.13.23.4861
303	196421715	3E2.5.19.37.7.887
L1 21	224703405	3E2.5.19.37.7103
304	199432948	2E2.11.13.151.2309
R9 X	213484172	2E2.11E2.197.2239
305	200328232	2E3.13.157.12269
L1 X	206790368	2E5.6462199
306	200879055	3E3.5.13.17.6733
L1 X	206393265	3E5.5.13.73.179
307	201168592	2E4.29.491.883
L1 33	203314448	2E4.67.89.2131
308	203055622	2.7.19.11.29.2393
L1 X	210627578	2.7E2.19.31.41.89
309	203972715	3E3.5.31.17.47.61
L1 X	207429525	3E3.5E2.31.23.431
310	204134385	3.5.7.13.17.19.463
L1 42	244869135	3.5.7.383.6089
311	204756904	2E3.11.59.113.349
L1 43	226163096	2E3.79.449.797
312	205843365	3E2.7E2.13.5.43.167
L1 31	254264283	3E2.7E2.13.44351
313	208693628	2E2.11.13.23.29.547
R9 53	255308932	2E2.31.167.12329
314	209027128	2E3.23.29.43.911
R9 43	224355272	2E3.37.383.1979
315	209309704	2E3.29.71.97.131
R9 43	209816696	2E3.19.83.16631
316	211319745	3.7.5.13.23.53.127
R9 55	234587199	3.7.11.17.31.41.47
317	214748488	2E3.17.19.41.2027
L1 42	245201912	2E3.3041.10079
318	216392216	2E3.19.53.26861
L1 33	218772184	2E3.17.659.2441
319	221397165	3E3.5.11.29.53.97
R9 43	235831635	3E3.5.13.83.1619
320	223878416	2E4.37.79.4787
L1 32	227342704	2E4.41.346559
321	224888895	3E2.7.11.5.41.1583
L1 32	273272769	3E2.7.11.83.4751
322	226540432	2E4.23.615599
L1 23	231465968	2E4.59.359.683
323	227443340	2E2.5.17.43.47.331
R9 52	302651764	2E2.1187.63743
324	231111392	2E5.109.173.383
W1 32	231923488	2E5.71.102079
325	238162815	3E3.5.23.11.19.367
L1 32	270560385	3E3.5.23.79.1103
326	238238864	2E4.41.47.7727
R9 33	244730224	2E4.97.137.1151
327	242126704	2E4.23.47.13999
L1 32	257841296	2E4.1399.11519
328	242182930	2.5.11.19.115877
L1 33	258410030	2.5.17.61.24919
329	245618415	3E2.5.19.7.41039
W1 23	266560785	3E2.5.19.31.89.113
330	248658488	2E3.13E2.183919
W2 X	256201912	2E3.37.43.20129

331	250876395	3E2.5.7.11.17.4259
L1 43	323303445	3E2.5.53.283.479
332	251302370	2.5.11.23.71.1399
R9 44	271244830	2.5.29.59.83.191
333	252551048	2E3.17.31.37.1619
R9 43	279327352	2E3.107.179.1823
334	252940545	3E2.5.13.11.23.1709
W1 32	284847615	3E2.5.13.89.5471
335	253703776	2E5.59.83.1619
L1 32	260678624	2E5.449.18143
336	256755056	2E4.19.79.10691
L1 32	273568144	2E4.2591.6599
337	256948065	3E3.5.11.23.7523
L1 22	263110815	3E3.5.11.53.3343
338	258904646	2.7.13.11.79.1637
L1 33	269448634	2.7.13.23.59.1091
339	260231192	2E3.13.659.3797
L1 33	266171608	2E3.19.593.2953
340	264764630	2.5.17.13.47.2549
L1 32	290441770	2.5.17.359.4759
341	265192208	2E4.131.23.5501
L1 22	275148208	2E4.131.251.523
342	267217335	3E2.5.7E2.11.23.479
R9 X	347397705	3E2.5.89.127.683
343	270039910	2.5.7.47.211.389
R9 X	301444250	2.5E3.79.15263
344	270208672	2E5.59.167.857
L1 32	274655648	2E5.131.65519
345	271048340	2E2.5.17.797201
L1 33	331636372	2E2.41.73.27701
346	271629728	2E5.37.383.599
L1 32	279947872	2E5.1709.5119
347	273141836	2E2.11.23.29.41.227
L1 53	306014644	2E2.13.239.24623
348	274638460	2E2.5.1693.8111
R9 34	302514116	2E2.17.43.307.337
349	274893410	2.5.11.43.89.653
W1 32	284512030	2.5.11.1187.2179
350	275304590	2.5.11.61.89.461
W1 32	281534770	2.5.11.139.18413
351	275631376	2E4.43.53.7559
R9 33	281207984	2E4.83.107.1979
352	276339808	2E5.97.127.701
L1 32	278431136	2E5.83.104831
353	278247976	2E3.17.41.139.359
L1 43	293288024	2E3.31.149.7937
354	281499435	3E3.5.7.89.3347
L1 33	297034965	3E3.5.17.29.4463
355	285627615	3.5.7E2.13.167.179
R9 33	293528865	3.5.7E2.29.47.293
356	286000065	3E5.5.13.19.953
R9 X	297390015	3E3.5.13.41.4133
357	287250632	2E3.17.127.16631
R9 34	287551288	2E3.31.53.131.167
358	287793350	2.5E2.13.41.10799
L1 33	302793850	2.5E2.23.251.1049
359	291679245	3E3.5.29.11.13.521
R9 32	339731955	3E3.5.29.107.811
360	291974824	2E3.19.89.113.191
R9 32	299001176	2E3.19.1367.1439

9D

361	295824376	2E3.19.53.36721
L1 33	299072024	2E3.17.601.3659
362	300120652	2E2.17.13.23.29.509
L1 42	347620148	2E2.17.179.28559
363	300208696	2E3.23.29.127.443
L1 43	313576904	2E3.31.89.14207
364	301685895	3E2.5.19E2.7E2.379
L1 X	342005985	3E2.5.19E2.37.569
365	302424784	2E4.53.71.5023
L1 33	303107888	2E4.47.107.3767
366	302770672	2E4.29.257.2539
L1 X	306676928	2E6.773.6199
367	304443436	2E2.31.61.11.3659
L1 X	305517524	2E2.31.61.13E2.239
368	305178874	2.7.19.11.13.71.113
R9 43	356714246	2.7.19.83.107.151
369	305363984	2E4.43.89.4987
L1 22	306962896	2E4.43.173.2579
370	305911606	2.7E2.11.13.83.263
R9 32	331160522	2.7E2.11.97.3167
371	308939936	2E5.37.311.839
W1 32	318479584	2E5.2393.4159
372	311414355	3E3.5.7E2.179.263
R9 X	338659245	3E3.5.23.29.3761
373	311913855	3E3.5.11.41.47.109
W1 32	326754945	3E3.5.11.139.1583
374	312090808	2E3.19.29.101.701
R9 43	332345192	2E3.53.67.11699
375	316293016	2E3.13.3041279
R9 24	322375784	2E3.41.71.109.127
376	318323864	2E3.23.61.79.359
R9 43	324492136	2E3.29.47.29759
377	318580262	2.7E2.11.13.127.179
L1 X	343312858	2.7.17.23.59.1063
378	319682650	2.5E2.7.59.113.137
L1 X	382593830	2.5.61.367.1709
379	319904235	3E4.5.7.19.5939
R9 33	370086165	3E4.5.43.79.269
380	320829728	2E5.59.109.1559
L1 32	327818272	2E5.199.51479
381	323401712	2E4.23.431.2039
R3 33	332270608	2E4.101.127.1619
382	324644792	2E3.19.29.47.1567
R9 43	352731208	2E3.79.89.6271
383	330811850	2.5E2.31.19.47.239
W1 32	354858550	2.5E2.31.179.1279
384	332448224	2E5.53.211.929
R9 X	338290096	2E4.53.269.1483
385	332573392	2E4.29.431.1663
R9 33	335955248	2E4.47.191.2339
386	334438875	3E4.5E3.17.29.67
R9 X	358687845	3E4.5.17.59.883
387	339981512	2E3.13.41.71.1123
R9 43	373803448	2E3.83.167.3371
388	343175404	2E2.11.13.379.1583
R9 33	364682516	2E2.11.131.151.419
389	346657311	3E2.7E2.13.11.23.239
R9 X	370393569	3E2.7.13.17.37.719
390	347263216	2E4.17.137.9319
L1 31	370414064	2E4.23150879

9D

391	347401035	3E3.5.17.19.31.257
R9 43	365917365	3E3.5.11.239.1031
392	348782488	2E3.31.23.47.1301
W1 32	371171432	2E3.31.557.2687
393	356775430	2.5.17.11.101.1889
L1 32	392753210	2.5.17.1427.1619
394	357197302	2.7.11.17.19.43.167
R9 42	409205258	2.7.11.863.3079
395	359156770	2.7E2.5.83.8831
R9 X	402020318	2.7.17.37.71.643
396	360027675	3E2.5E2.19.7.53.227
R9 X	433850085	3E2.5.19.557.911
397	360172336	2E4.17.149.8887
L1 32	383753264	2E4.2221.10799
398	360759652	2E2.11.17.29.16631
L1 32	393667868	2E2.11.263.34019
399	362645570	2.7E2.5.643.1151
R9 X	398531518	2.7.11.47.55061
400	362700728	2E3.13.19.173.1061
R9 42	413408872	2E3.811.63719
401	364182075	3E4.5E2.17.71.149
R9 33	365012325	3E4.5E2.19.53.179
402	370032676	2E2.17.13.19.22031
R9 33	407256284	2E2.17.67.71.1259
403	371840350	2.7.31.5E2.43.797
R9 X	464106146	2.7E2.31.152767
404	373305350	2.5E2.11.19.139.257
R9 42	432893050	2.5E2.859.10079
405	375401624	2E3.13.73.197.251
R3 43	399982216	2E3.43.97.11987
406	377141350	2.5E2.31.23.71.149
W1 32	394237850	2.5E2.31.53.4799
407	382170512	2E4.41.83.7019
R9 33	385592848	2E4.59.97.4211
408	385465395	3.5.7.23.17.41.229
L1 32	415773645	3.5.7.23.107.1609
409	388904355	3E3.5.7.23.29.617
R9 43	465418845	3E3.5.59.71.823
410	391548675	3.5E2.7.17.19.2309
L1 32	433398525	3.5E2.7.139.5939
411	393463072	2E5.43.269.1063
L1 32	402877088	2E5.251.50159
412	394800070	2.7.5.41.151.911
R9 X	443597882	2.7E2.13.191.1823
413	395378272	2E5.103.139.863
R9 33	397151648	2E5.181.191.359
414	395939775	3.5E2.11.7.17.37.109
R9 X	499717185	3.5.11.61.131.379
415	397287345	3.5.7E2.13.41579
W1 23	399052815	3.5.7E2.17.109.293
416	400250565	3E4.11.5.13.6911
R9 34	442792251	3E4.11.17.23.31.41
417	404185672	2E3.11.1877.2447
L1 33	423336248	2E3.31.101.16901
418	405370035	3E3.5.7.19.107.211
R9 43	473836365	3E3.5.29.127.953
419	406640992	2E5.47.167.1619
L1 32	416370848	2E5.251.51839
420	407641130	2.5.13.17.139.1327
R9 44	435691990	2.5.23.59.97.331

421	414195782	2.7.11.13.19.10889	9D
L1 32	463973818	2.7.11.83.36299	
422	419640364	2E2.13.11.83.8839	
R9 X	453610196	2E2.13E3.71.727	
423	425948050	2.5E2.11.269.2879	
R9 33	441853550	2.5E2.19.479.971	
424	426191535	3E2.7.11.5.47.2617	
W1 32	514780497	3E2.7.11.67.11087	
425	426386025	3E5.5E2.13.5399	
R9 X	426684375	3E3.5E5.13.389	
426	427448510	2.5.17.19.59.2243	
R9 33	445018690	2.5.17.67.89.439	
427	427950350	2.5E2.31.17.109.149	
L1 32	455921650	2.5E2.31.107.2749	
428	429035596	2E2.11.17.43.13339	
R3 33	458447924	2E2.11.173.229.263	
429	430848592	2E4.29.67.13859	
R9 33	445657808	2E4.131.149.1427	
430	436386015	3E3.5.19.13.23.569	
R9 32	482909985	3E3.5.19.59.3191	
431	437888168	2E3.23.29.137.599	
W1 32	456351832	2E3.23.827.2999	
432	438362984	2E3.19.43.47.1427	
R9 43	466417816	2E3.31.503.3739	
433	438452624	2E4.29.179.5279	
L1 33	445419376	2E4.47.499.1187	
434	439232624	2E4.37.53.13999	
L1 33	451335376	2E4.89.151.2099	
435	442480816	2E4.19.971.1499	
R9 33	461479184	2E4.179.269.599	
436	447761144	2E3.19.113.131.199	
R9 32	455118856	2E3.19.197.15199	
437	460122410	2.5.11.29.97.1487	
R9 44	484817110	2.5.19.71.83.433	
438	465605192	2E3.13.23.61.3191	
R9 42	531830968	2E3.6271.10601	
439	466389344	2E5.71.131.1567	
L1 32	472453792	2E5.107.137983	
440	467406225	3E2.5E2.13.11.73.199	
R9 X	534612975	3.5E2.13.19.28859	
441	471696190	2.5.7.23.292979	
R9 33	540842690	2.5.37.79.18503	
442	474179596	2E2.31.11.41.61.139	
R9 43	505757684	2E2.31.17.79.3037	
443	475838415	3E3.5.13.17.41.389	
W1 32	514823985	3E3.5.13.233.1259	
444	487169380	2E2.37.5.41.16057	
W1 32	589230476	2E2.37.61.65267	
445	491373104	2E4.23.107.12479	
R3 33	511419856	2E4.127.389.647	
446	492275992	2E3.131.13.23.1571	
R9 31	553544168	2E3.131.528191	
447	494495768	2E3.13.23.61.3389	
R9 42	564811432	2E3.5039.14011	
448	504555070	2.5.17.19.31.5039	
R9 44	540539330	2.5.23.71.79.419	
449	506468950	2.5E2.13.37.21059	
L1 X	535495610	2.5.13.269.15313	
450	509379344	2E4.23.347.3989	
R9 33	523679536	2E4.83.179.2203	
451	512412550	2.5E2.13.73.10799	9D
L1 33	528145850	2.5E2.19.167.3329	
452	514439224	2E3.13.89.55579	
L1 33	536022776	2E3.29.97.23819	
453	519257296	2E4.29.83.97.139	
R9 42	552549104	2E4.881.39199	
454	520218704	2E4.29.71.15791	
R9 33	537213616	2E4.107.167.1879	
455	522145832	2E3.13.173.29021	
L1 X	538318048	2E5.2029.8291	
456	525254368	2E5.37.271.1637	
L1 32	541358816	2E5.1481.11423	
457	526271456	2E5.79.179.1163	
R9 33	529709344	2E5.193.199.431	
458	526552472	2E3.19.71.97.503	
R9 44	540314728	2E3.41.83.89.223	
459	529714744	2E3.13.59.131.659	
R9 43	567997256	2E3.47.109.13859	
460	536637465	3E2.7E2.13.97.5.193	
L1 21	646745463	3E2.7E2.13.97.1163	
461	537882550	2.5E2.31.17.137.149	
W1 32	570975050	2.5E2.31.89.4139	
462	540759375	3E3.5E5.13.17.29	
R9 X	640415025	3E3.5E2.269.3527	
463	541114808	2E3.13.863.6029	
L1 33	552968392	2E3.23.89.33767	
464	545134144	2E6.157.227.239	
R9 32	552877376	2E6.1579.5471	
465	551388915	3E2.5.7E2.11.127.179	
R9 X	677841165	3E2.5.23.569.1151	
466	553978490	2.5.13.17.439.571	
W1 32	587641990	2.5.13.479.9437	
467	557346712	2E3.13.397.13499	
R9 33	570983288	2E3.19.1049.3581	
468	558173344	2E5.41.467.911	
L1 32	571181792	2E5.233.76607	
469	558410475	3.5E2.19.7.17.37.89	
R9 43	662939925	3.5E2.19.23.113.179	
470	559334930	2.7.5.11.23.31583	
R9 43	750516718	2.7.71.281.2687	
471	573216416	2E5.79.197.1151	
R9 33	576387424	2E5.131.359.383	
472	577884195	3E2.5.7E2.262079	
L1 X	587323485	3E2.5.7.1091.1709	
473	579926204	2E2.13E2.11.167.467	
R9 X	628681924	2E2.13.103.107.1097	
474	579980048	2E4.29.179.6983	
R9 33	589141552	2E4.79.89.5237	
475	585057992	2E3.17.23.359.521	
R9 43	632663608	2E3.59.107.12527	
476	586188070	2.5.13.41.71.1549	
R9 44	594986330	2.5.19.29.83.1301	
477	586200224	2E5.79.461.503	
R9 33	587353696	2E5.131.167.839	
478	595858064	2E4.37.179.5623	
L1 22	596654896	2E4.37.239.4217	
479	596668490	2.5.11.41.132299	
R9 34	603557110	2.5.13.53.251.349	
480	600418910	2.7.5.13.23.28687	
R9 43	787621282	2.7.43.223.5867	
481	601020945	3E3.5.7.647.983	9D
L1 33	623232495	3E3.5.17.23.11807	
482	601235145	3E2.5.19.7E2.113.127	
R9 X	696285495	3E2.5.19.47.17327	
483	602035390	2.5.11.41.131.1019	
W1 32	619418690	2.5.11.239.23561	
484	606235455	3E3.5.7.641519	
R9 24	625482945	3E3.5.19.43.53.107	
485	613290028	2E2.17.13.29.47.509	
R9 43	682191572	2E2.17.71.101.1399	
486	621354896	2E4.17.167.13679	
L1 32	661063024	2E4.809.51071	
487	625955024	2E4.29.47.28703	
R9 33	655391536	2E4.239.367.467	
488	626323995	3E7.5.41.11.127	
R9 X	643272165	3E3.5.41.23.31.163	
489	630007455	3.5.7E2.11.29.2687	
R9 X	693778785	3.5.7.23.287279	
490	637756665	3.5.7.13.59.7919	
R9 34	639580935	3.5.7.29.41.47.109	
491	640001054	2.7E2.19.11.31247	
R9 X	642416866	2.7.19.13.37.5021	
492	640866135	3.5.7.23.13.137.149	
L1 32	694532265	3.5.7.23.139.2069	
493	643006485	3E3.5.11.41.59.179	
R9 44	663361515	3E3.5.23.29.53.139	
494	647314690	2.5.11.43.107.1279	
W1 32	666518270	2.5.11.263.23039	
495	651016665	3E2.5.13.19.37.1583	
L1 22	663576615	3E2.5.13.19.227.263	
496	653078426	2.7.31.11.13.17.619	
R9 43	786829414	2.7.31.53.79.433	
497	658009485	3E2.5.7E3.89.479	
R9 X	689830515	3E2.5.11.47.149.199	
498	659084504	2E3.13.23.61.4517	
L1 42	752700136	2E3.3347.28111	
499	659854052	2E2.13.11.29.39779	
W1 32	743584348	2E2.13.701.20399	
500	660792650	2.5E2.7.149.12671	
L1 32	753402550	2.5E2.109.138239	
501	664747083	3E2.7E2.13.11.83.127	
R9 33	673747893	3E2.7E2.13.17.31.223	
502	665113060	2E2.5.31.1072763	
R9 34	776681756	2E2.23.107.257.307	
503	666030256	2E4.331.19.6619	
L1 22	696630544	2E4.331.199.661	
504	672672884	2E2.13.19.97.7019	
L1 32	675728716	2E2.13.17.764399	
505	677781140	2E2.5.227.337.443	
R9 44	759308332	2E2.17.73.151.1013	
506	681310575	3E3.5E2.11.89.1031	
R9 33	700743825	3E3.5E2.17.79.773	
507	681709490	2.5.7.11.929.953	
L1 42	851406670	2.5.2879.29573	
508	683490885	3.5.7.11E2.23.2339	
R9 X	750610875	3.5E3.7.269.1063	
509	685939088	2E4.29.503.2939	
R9 33	692097712	2E4.41.349.3023	
510	688679775	3E2.5E2.7.17E3.89	
R9 X	825955425	3E2.5E2.71.149.347	
511	691075330	2.5.17.11.101.3659	9D
L1 32	760392830	2.5.17.719.6221	
512	698002450	2.5E2.29.41.59.199	
R9 43	708157550	2.5E2.19.71.10499	
513	698049512	2E3.17.19.270143	
L1 33	760728088	2E3.47.1259.1607	
514	701168432	2E4.23.107.17807	
L1 32	729739984	2E4.83.549503	
515	704374540	2E2.23.5.137.11177	
L1 32	850529972	2E2.23.971.9521	
516	705023055	3E3.5.11.43.61.181	
R9 X	724885425	3E2.5E2.11.109.2687	
517	705280310	2.7.37.5.307.887	
R9 33	791333578	2.7.37.17.73.1231	
518	721522755	3E3.5.17.29.37.293	
R9 X	726368445	3E3.5.11E2.53.839	
519	728921270	2.5.7.11.929.1019	
L1 42	910259530	2.5.2447.37199	
520	749380864	2E8.383.7643	
L1 22	750555392	2E8.1567.1871	
521	750893325	3.5E2.7.13.269.409	
L1 32	786508275	3.5E2.7.29.51659	
522	751953405	3.5.7.19.37.61.167	
R9 X	767949315	3.5.7E2.19.127.433	
523	752458216	2E3.17.19.291199	
L1 33	820021784	2E3.47.1091.1999	
524	754484445	3E2.5.13E2.11.29.311	
R9 32	848771235	3E2.5.13E2.233.479	
525	761197736	2E3.13.1151.6359	
L1 34	777413464	2E3.41.47.211.239	
526	761511104	2E6.223.229.233	
R9 32	769560256	2E6.389.30911	
527	762662128	2E4.19.263.9539	
R9 33	798845072	2E4.239.317.659	
528	766292835	3.5.7.11.503.1319	
L1 22	766512285	3.5.7.11.769.863	
529	769289955	3.5.7E2.19.31.1777	
L1 X	787384605	3.5.7.19.37.10667	
530	770805945	3E2.7.13.41.5.4591	
L1 22	914053959	3E2.7.13.41.163.167	
531	776813895	3E5.11.13.5.17.263	
L1 32	966751929	3E5.11.13.43.647	
532	786882915	3E2.7E2.13.5.97.283	
L1 32	945492093	3E2.7E2.13.83.1987	
533	788056335	3E2.5.11.17.71.1319	
R9 33	813177585	3E2.5.11.31.197.269	
534	802162790	2.5.11.13.167.3359	
R9 44	904824730	2.5.47.89.97.223	
535	807848864	2E5.61.163.2539	
L1 X	819234496	2E6.1301.9839	
536	807964592	2E4.29.47.37049	
R9 33	845947408	2E4.199.389.683	
537	821903384	2E3.29.41.71.1217	
R9 33	835551016	2E3.29.97.107.347	
538	821921625	3E2.5E3.7.29.59.61	
R9 X	988676775	3E2.5E2.71.199.311	
539	826499835	3E3.5.7.31.89.317	
R9 43	931912965	3E3.5.23.59.5087	
540	836535328	2E5.47.101.5507	
W1 32	862396256	2E5.1733.15551	

9D

541	845397735	3.5.7E2.13.103.859
R9 X	867557145	3.5.7.13.569.1117
542	846862965	3E3.5.13.19.109.233
W1 32	882865035	3E3.5.13.43.11699
543	848764124	2E2.19.13.23.41.911
R9 43	953056036	2E2.19.47.251.1063
544	854687570	2.5.11.59.79.1667
R9 43	874694830	2.5.19.23.200159
545	855737264	2E4.23.1259.1847
R3 33	876651856	2E4.97.107.5279
546	856305272	2E3.23.29.383.419
R9 44	885518728	2E3.47.59.179.223
547	857161935	3E2.5.31.7.61.1439
R9 33	925581105	3E2.5.31.19.47.743
548	861314660	2E2.53.5.211.3851
R9 33	990788572	2E2.53.23.317.641
549	869530725	3E2.5E2.7E3.19.593
R9 X	1045525275	3E2.5E2.89.109.479
550	870675856	2E4.23.313.7559
R9 33	895461104	2E4.83.179.3767
551	874591550	2.5E2.7.1499.1667
L1 32	986896450	2.5E2.71.277999
552	877324936	2E3.29.47.61.1319
R3 42	890419064	2E3.17.6547199
553	891089368	2E3.13.23.401.929
R9 43	993165032	2E3.167.179.4153
554	894012525	3E3.5E2.7.431.439
R9 33	991581075	3E3.5E2.43.127.269
555	894690615	3.5.7.13.53.83.149
R9 43	934224585	3.5.7.19.59.7937
556	902335744	2E8.383.9203
L1 22	903709952	2E8.1151.3067
557	903825416	2E3.47.13.179.1033
W1 32	972264184	2E3.47.131.19739
558	905196776	2E3.11.31.389.853
R9 43	1013228824	2E3.139.487.1871
559	907960904	2E3.19.79.83.911
R9 32	930631096	2E3.19.1279.4787
560	912404025	3E2.5E2.13.17.59.311
R9 X	988724295	3E2.5.13.61.103.269
561	914746450	2.5E2.31.19.89.349
W1 32	960133550	2.5E2.31.59.10499
562	916021964	2E2.13.11.59.27143
R9 33	999258676	2E2.13.79.347.701
563	917168950	2.5E2.19.37.97.269
W1 32	953023850	2.5E2.19.587.1709
564	925949992	2E3.83.11.331.383
L1 32	1001668568	2E3.83.71.21247
565	930793204	2E2.19.11.59.113.167
R9 43	999728396	2E2.19.23.239.2393
566	932913124	2E2.11.13E2.109.1151
R9 X	1015026716	2E2.11.191.120779
567	938304290	2.11.5.7.17.43.1667
R9 53	1344480478	2.11.31.197.10007
568	948760928	2E5.79.263.1427
R9 33	951278752	2E5.109.223.1223
569	949308932	2E2.19.11.13.113.773
R9 42	1126001788	2E2.19.3191.4643
570	950850140	2E2.5.1091.43577
R9 34	1047811252	2E2.17.41.233.1613

571	954392504	2E3.13.37.197.1259
R9 43	1036457896	2E3.43.1619.1861
572	957871508	2E2.11.29.71.97.109
R9 43	998051692	2E2.11.53.139.3079
573	962951312	2E4.19.1693.1871
L1 33	1003172848	2E4.131.307.1559
574	965615992	2E3.11.23.349.1367
R9 42	1102800008	2E3.3359.41039
575	965674256	2E4.17.599.5927
L1 32	1019020144	2E4.191.333449
576	967887488	2E7.61.113.1097
R9 X	1011081832	2E3.61.37.55997
577	967947856	2E4.19E2.103.1627
R9 X	1031796176	2E4.3847.16763
578	968410624	2E9.61.101.307
R9 X	1024180592	2E4.241.265607
579	969473384	2E3.11.67.164429
L1 33	1043149816	2E3.53.101.24359
580	969642056	2E3.17.31.349.659
R9 43	1026197944	2E3.29.383.11549
581	978888550	2.5E2.31.43.19.773
R9 X	1048124570	2.5.31.43.61.1289
582	989779882	2.7.19.13.17.113.149
R9 X	1078636118	2.7E2.19.41.71.199
583	991838384	2E4.23.167.16139
R9 33	1025532496	2E4.79.503.1613
584	992776995	3E2.5.7E2.450239
L1 X	1008990045	3E2.5.7.797.4019
585	994945490	2.7E2.5.11E2.97.173
R9 X	1331936326	2.7E2.881.15427
586	996088412	2E2.11.17.151.8819
R9 45	1030959268	2E2.23.37.41.83.89
587	1000233608	2E3.11.59.383.503
L1 43	1089955192	2E3.47.863.3359
588	1002372250	2.5E3.11.364499
L1 23	1044659750	2.5E3.29.89.1619
589	1002455350	2.5E2.13.1542239
L1 X	1005541130	2.5.11.59.154937
590	1015866225	3E3.5E2.11.41.47.71
R9 X	1143995535	3E3.5.17.503.991
591	1016475064	2E3.11.23.349.1439
R9 42	1160804936	2E3.2999.48383
592	1018330430	2.5.13.17.197.2339
L1 32	1083289090	2.5.13.1619.5147
533	1020658815	3E2.5.11.19.47.2309
R9 33	1055014785	3E2.5.11.31.197.349
594	1024706624	2E6.103.359.433
R9 32	1038911296	2E6.1091.14879
595	1033407104	2E7.83.211.461
R9 X	1064553376	2E5.1019.32647
596	1034955988	2E2.11.17.1049.1319
R3 33	1060676012	2E2.11.43.89.6299
597	1040792450	2.5E2.31.19.59.599
L1 32	1101927550	2.5E2.31.79.8999
598	1047381370	2.5.7E3.47.73.89
R9 X	1254314630	2.5.59.443.4799
599	1047784504	2E3.13.23.101.4337
R9 42	1182294536	2E3.167.884951
600	1047827656	2E3.19.71.151.643
W1 32	1066553144	2E3.19.227.30911

10D

601	1049859195	3.5.7.11.191.4759
R9 33	1055812485	3.5.7.13.79.9791
602	1056277222	2.7E2.19.11.13.3967
R9 X	1223576858	2.7.19.41.151.743
603	1066176716	2E2.11.19.251.5081
R9 33	1085338804	2E2.11.29.293.2903
604	1067740245	3E3.5.11.13.19.41.71
R9 52	1370813355	3E3.5.2687.3779
605	1069306732	2E2.13.41.17.163.181
R9 32	1142071892	2E2.13.41.491.1091
606	1077722984	2E3.13.1913.5417
L1 X	1099987936	2E5.179.192037
607	1082038815	3E2.5.13.11.181.929
R9 X	1135944225	3E2.5E2.13.83.4679
608	1086272836	2E2.11.29.47.59.307
R9 43	1149067964	2E2.11.89.139.2111
609	1086321110	2.5.7.37.419429
R9 X	1208799850	2.5E2.71.163.2089
610	1088205734	2.7.11.17.19.131.167
R9 43	1211001946	2.7.11.179.197.223
611	1090509248	2E6.109.223.701
L1 32	1106245312	2E6.1637.10559
612	1091947540	2E2.23.5.137.17327
L1 32	1318446572	2E2.23.911.15731
613	1093953735	3E3.5.7.89.13007
L1 33	1153828665	3E3.5.11.239.3251
614	1100526075	3E3.5E2.11.19.29.269
R9 42	1310033925	3E3.5E2.809.2399
615	1101570165	3E3.5.17.23.41.509
R9 33	1119255435	3E3.5.17.29.67.251
616	1110676384	2E5.97.179.1999
R9 33	1111963616	2E5.83.499.839
617	1112824370	2.5.7.59.227.1187
R9 44	1227440590	2.5.37.43.179.431
618	1118297565	3E2.5.7.11.29.31.359
R9 53	1469555235	3E2.5.79.479.863
619	1123132540	2E2.53.5.17.62327
L1 32	1421345732	2E2.53.251.26711
620	1127508130	2.5.7E2.31.199.373
R9 X	1328325470	2.5.43.271.11399
621	1129315275	3E2.5E2.31.11.41.359
R9 X	1210534965	3E2.5.31.23.29.1301
622	1131258975	3.5E2.31.7.11.71.89
R9 X	1337154465	3.5.31.17.47.59.61
623	1133458150	2.5E2.11.347.5939
L1 X	1173447770	2.5.11.929.11483
624	1141149196	2E2.11.19.1365011
W1 23	1152070964	2E2.11.43.53.11489
625	1148440336	2E4.37.71.89.307
R9 43	1202659184	2E4.167.659.683
626	1162074914	2.7.11.13.43.13499
L1 33	1232933086	2.7.11.29.359.769
627	1179749410	2.5.7.151.239.467
R9 X	1278710750	2.5E3.37.138239
628	1183083825	3.5E2.7.11.349.587
R9 X	1266759375	3.5E5.7.97.199
629	1191953763	3E2.7E2.11.13.41.461
L1 21	1223611389	3E2.7E2.11.13.19403
630	1193945522	2.7.11.19.53.7699
L1 33	1201062478	2.7.11.17.149.3079

10D

631	1195637144	2E3.13E2.383.2309
L1 X	1239287656	2E3.23.239.28181
632	1197281380	2E2.5.31.967.1997
R9 43	1402100636	2E2.17.2441.8447
633	1206344152	2E3.13.37.251.1249
R9 43	1307355848	2E3.41.1499.2659
634	1211220868	2E2.13.11.181.11699
R9 33	1292953532	2E2.13.41.389.1559
635	1212636350	2.5E2.17.67.107.199
W1 32	1246134850	2.5E2.17.719.2039
636	1216541326	2.7E2.11.13.47.1847
R9 32	1331747186	2.7E2.11.197.6271
637	1216935225	3E3.5E2.31.11.17.311
R9 X	1457179335	3E3.5.31.348191
638	1223289664	2E6.251.271.281
R9 32	1231545152	2E6.223.86291
639	1224145112	2E3.17.31.103.2819
R9 43	1309794088	2E3.53.79.39103
640	1225052829	3E4.7.11.29.13.521
L1 21	1321639011	3E4.7.11.29.7307
641	1237888448	2E6.73.264959
L1 22	1252205632	2E6.479.40847
642	1239061725	3E3.5E2.11.19.8783
R9 33	1375056675	3E3.5E2.47.89.487
643	1239657136	2E4.17.727.6269
L1 32	1307367344	2E4.181.451439
644	1241180168	2E3.19.59.138401
L1 33	1250055832	2E3.17.263.34949
645	1241809540	2E2.5.17.37.98713
R9 43	1594046252	2E2.113.131.26921
646	1249677032	2E3.23.67.167.607
R9 44	1250808088	2E3.31.37.271.503
647	1251532282	2.7.11E2.13.17.3343
R9 X	1438327814	2.7.11.9339791
648	1254255550	2.5E2.23.19.137.419
R9 31	1333078850	2.5E2.23.1159199
649	1255307438	2.7.11.17.53.83.109
R9 43	1331301202	2.7.11.29.307.971
650	1264688650	2.5E2.17.53.67.419
R9 X	1317021110	2.5.17.61.89.1427
651	1272724250	2.7.5E3.727271
L1 X	1450182118	2.7.11.251.37517
652	1273481176	2E3.11.29.569.877
R9 43	1429002824	2E3.179.379.2633
653	1273666394	2.7.11.13.41.59.263
R9 43	1408742566	2.7.11.83.307.359
654	1275751408	2E4.41.79.103.239
R9 43	1324082192	2E4.89.727.1279
655	1277879584	2E5.59.71.9533
L1 32	1316893856	2E5.1259.32687
656	1284072075	3E3.5E2.11.13.53.251
R9 X	1550746485	3E3.5.41.503.557
657	1289325975	3.5E2.7E2.41.43.199
R9 X	1323006825	3.5E2.7.29.113.769
658	1292286248	2E3.11.499.29429
L1 33	1356413752	2E3.29.149.39239
659	1303670522	2.7.11.19.41.10867
R9 X	1325516038	2.7.11E2.19.41183
660	1305577305	3E3.5.19.17.79.379
R9 33	1320982695	3E3.5.19.31.37.449

661	1309651310	2.5.11.29.571.719	10D
R9 31	1359071890	2.5.11.12355199	
662	1312909796	2E2.11.17.109.16103	
R3 33	1365507484	2E2.11.43.269.2683	
663	1321560765	3E4.5.7.59.7901	
R9 33	1432128195	3E4.5.17.79.2633	
664	1323789350	2.5E2.13.67.113.269	
R9 X	1401348730	2.5.29.37.61.2141	
665	1327395368	2E3.13.1511.8447	
R9 34	1355013592	2E3.41.43.191.503	
666	1333290105	3E3.5.7.23.61343	
R3 33	1493441415	3E3.5.17.191.3407	
667	1335474855	3E2.5.13.11.37.71.79	
R9 42	1532728665	3E2.5.13.431.6079	
668	1347375272	2E3.19.89.137.727	
R9 43	1365152728	2E3.29.41.143519	
669	1348200032	2E5.59.461.1549	
L1 X	1358657968	2E4.53.109.14699	
670	1357689830	2.5.7.107.109.1663	
R9 X	1488948250	2.5E3.47.126719	
671	1363688048	2E4.17.191.26249	
L1 32	1448631952	2E4.503.179999	
672	1365633296	2E4.37.107.21559	
L1 33	1377316144	2E4.43.227.8819	
673	1375090832	2E4.17.379.13339	
L1 32	1453522768	2E4.227.400199	
674	1386737770	2.5.11.17.59.12569	
R9 43	1545591830	2.5.29.53.100559	
675	1395217845	3E3.5.7.53.89.313	
R9 43	1534778955	3E3.5.17.71.9419	
676	1400735930	2.5.11E2.31.107.349	
R9 X	1495046470	2.5.17.139.151.419	
677	1420875830	2.5.79.11.23.7109	
L1 32	1527783370	2.5.79.17.113759	
678	1444854411	3E2.7.13.23.11.19.367	
L1 32	1641399669	3E2.7.13.23.79.1103	
679	1448711355	3.5.7.13.17.149.419	
R9 43	1599480645	3.5.7.29.139.3779	
680	1448998330	2.5.19.13.569.1031	
R9 33	1515731270	2.5.19.37.251.859	
681	1456694650	2.5E2.31.23.29.1409	
W1 32	1564540550	2.5E2.31.179.5639	
682	1458334432	2E5.53.73.11779	
R9 X	1507257008	2E4.89.251.4217	
683	1470622335	3.5.7.13.29.97.383	
R9 43	1564022145	3.5.7.19.127.6173	
684	1486565325	3E3.5E2.7.23.13679	
R9 32	1770369075	3E3.5E2.911.2879	
685	1502495085	3.7E2.13.5.157247	
R9 24	1509118611	3.7E2.13.11.17.41.103	
686	1505175008	2E5.71.167.3967	
R9 33	1518631456	2E5.127.433.863	
687	1517112765	3E2.5.7E2.47.14639	
R9 X	1607180355	3E2.5.11.59.113.487	
688	1518524175	3.5E2.7.19.41.47.79	
R9 42	1681271025	3.5E2.7.139.23039	
689	1525222575	3E3.5E2.17.23.5779	
L1 22	1571007825	3E3.5E2.17.79.1733	
690	1528753832	2E3.17.19.591623	
L1 33	1666015768	2E3.47.809.5477	
691	1532931010	2.5.13.29.79.5147	
R9 33	1580579390	2.5.13.107.199.571	
692	1546818128	2E4.47.109.113.167	
R9 43	1587981232	2E4.83.151.7919	
693	1548287895	3.5.7.11.23.167.349	
R9 43	1703116905	3.5.7.31.89.5879	
694	1550703136	2E5.59.317.2591	
L1 32	1564984544	2E5.89.549503	
695	1558818261	3E2.7.11.13.23.7523	
L1 22	1596205611	3E2.7.11.13.53.3343	
696	1559105008	2E4.43.67.149.227	
R9 43	1613013392	2E4.109.179.5167	
697	1559592628	2E2.11.43.53.103.151	
R9 43	1595431244	2E2.11.31.311.3761	
698	1563999255	3E2.7.13.5.167.2287	
R9 33	1793979369	3E2.7.13.23.131.727	
699	1574216272	2E4.19.971.5333	
R9 33	1640265488	2E4.107.761.1259	
700	1577617335	3E2.5.7.137.139.263	
W1 32	1605082185	3E2.5.7.1439.3541	
701	1585667930	2.7E2.5.11.37.7951	
R9 X	2134722982	2.7.83.227.8093	
702	1600185752	2E3.11.53.103.3331	
R9 43	1768066408	2E3.101.167.13103	
703	1601150265	3E2.5.13.11.61.4079	
R9 X	1713637575	3E2.5E2.13.509.1151	
704	1607089672	2E3.23.37.59.4001	
R9 32	1677751928	2E3.23.2203.4139	
705	1618057875	3.5E3.17.7.101.359	
R9 X	1681454445	3.5.17.11.23.67.389	
706	1626481616	2E4.23.149.29663	
R9 33	1684020784	2E4.107.199.4943	
707	1662154065	3E2.5.13.11.258299	
L1 23	1722609135	3E2.5.13.29.59.1721	
708	1666611045	3E4.5.11E2.71.479	
L1 22	1670433435	3E4.5.11E2.89.383	
709	1666776566	2.7.31.13.29.61.167	
R9 X	1693008394	2.7.31.11.67E2.79	
710	1667890144	2E5.37.223.6317	
R9 32	1720175264	2E5.2591.20747	
711	1689026570	2.7E2.5.11.41.7643	
R9 42	2263716406	2.7E2.1567.14741	
712	1690397588	2E2.11E2.29.83.1451	
R9 33	1716168652	2E2.11E2.41.197.439	
713	1699746184	2E3.23.41.233.967	
R3 42	1725115256	2E3.17.12684671	
714	1721688850	2.7.31.5E2.107.1483	
R9 X	2094066926	2.7.31.61.83.953	
715	1723336461	3E2.7.11.17.19.7699	
R9 X	1736119539	3E2.7E3.11.29.41.43	
716	1728342296	2E3.19.53.214541	
L1 33	1747238104	2E3.17.521.24659	
717	1741985325	3E3.5E2.31.17.59.83	
R9 32	1857784275	3E3.5E2.31.47.1889	
718	1750776704	2E7.137.99839	
L1 22	1762592896	2E7.2879.4783	
719	1754082603	3E2.7.13E3.19.23.29	
R9 X	1810205397	3E2.7.13.11.67.2999	
720	1755729656	2E3.19.23.349.1439	
R9 43	1873070344	2E3.31.1249.6047	
721	1756703660	2E2.5.23.31.123191	10D
L1 43	2216977492	2E2.53.191.54751	
722	1763439656	2E3.11.29.251.2753	
R9 43	1984203544	2E3.179.971.1427	
723	1772982530	2.5.11.17.19.139.359	
R9 53	2146121470	2.5.107.199.10079	
724	1774259235	3E4.5.7.19.32939	
L1 X	2052051165	3E9.5.29.719	
725	1775992725	3E2.5E2.13.23.26399	
R9 X	1798778475	3E3.5E2.13.359.571	
726	1783852785	3E2.5.13.11E3.29.79	
R9 X	2052998415	3E2.5.13.1151.3049	
727	1785186728	2E3.13.17.787.1283	
R9 42	2039387032	2E3.6047.42157	
728	1786141665	3E3.5.7.11.171827	
R9 33	2172775455	3E3.5.47.443.773	
729	1786492785	3.5.7.11.293.5279	
L1 22	1790052495	3.5.7.11.1231.1259	
730	1793313730	2.5.31.13.479.929	
R9 33	1806455870	2.5.31.17.79.4339	
731	1796310350	2.5E2.23.19.229.359	
R9 32	1899881650	2.5E2.23.479.3449	
732	1812992710	2.5.17.23.29.59.271	
R9 42	1994136890	2.5.17.599.19583	
733	1813297395	3.5.7.13.19.139.503	
R9 43	1980008205	3.5.7.29.79.8231	
734	1814936354	2.7.19.11E2.17.31.107	
R9 X	2156422366	2.7.19.71.227.503	
735	1819124752	2E4.19.593.10091	
R9 33	1897557008	2E4.131.347.2609	
736	1829456590	2.5.13.29.127.3821	
R9 33	1869016370	2.5.13.97.103.1439	
737	1860630824	2E3.13.17.691.1523	
R9 42	2125787416	2E3.9341.28447	
738	1861960700	2E2.5E2.17.593.1847	
R9 X	2425702372	2E2.131.433.10691	
739	1862890150	2.5E2.11.19.89.2003	
R9 42	2162745050	2.5E2.1439.30059	
740	1874188690	2.5.19.11.59.15199	
L1 32	2065651310	2.5.19.151.71999	
741	1879626735	3E3.5.107.7.29.641	
R9 32	2114126865	3E3.5.107.19.7703	
742	1888560272	2E4.29.107.38039	
R9 33	1932177328	2E4.53.719.3169	
743	1892277387	3E2.7.11.13.41.47.109	
R9 32	1982313333	3E2.7.11.13.139.1583	
744	1892277488	2E4.19.739.8423	
R9 33	1972653712	2E4.107.1039.1109	
745	1895700345	3.7.11E2.17.5.67.131	
R9 X	2230100103	3.7E2.11.17.31.2617	
746	1900066455	3E2.7.5.17.23.15427	
R9 44	2258828649	3E2.7.11.83.173.227	
747	1915705352	2E3.53.11.431.953	
W1 32	2090178808	2E3.53.317.15551	
748	1929310100	2E2.5E2.83.191.1217	
R9 X	2333417068	2E2.23.4463.5683	
749	1930301618	2.7.19.17.37.83.139	
R9 X	1930741582	2.7.19.11E2.223.269	
750	1937813620	2E2.5.97.631.1583	
R9 43	2182664588	2E2.13.593.70783	
751	1938775850	2.5E2.11.47.179.419	10D
R9 43	2110964950	2.5E2.41.149.6911	
752	1954734364	2E2.11.19.593.3943	
R9 33	1981062116	2E2.11.43.59.17747	
753	1957374968	2E3.31.17.107.4339	
L1 31	2092365832	2E3.31.8436959	
754	1964397015	3E4.5.7E3.79.179	
R9 X	2217362985	3E3.5.19.131.6599	
755	1974754485	3E4.5.11E2.59.683	
L1 22	1987985835	3E4.5.11E2.113.359	
756	1978830070	2.7.5.23.97.12671	
R9 44	2313024266	2.7.31.41.43.3023	
757	1981631584	2E5.59.71.14783	
L1 32	2041981856	2E5.1187.53759	
758	1983736876	2E2.11.19E2.71.1759	
R9 X	2071810004	2E2.11.43.719.1523	
759	1990129570	2.5.11.13.431.3229	
R9 44	2229439070	2.5.37.67.139.647	
760	1990992825	3E3.5E2.31.17.29.193	
L1 32	2165883975	3E3.5E2.31.89.1163	
761	1991349664	2E5.41.251.6047	
L1 32	2041408352	2E5.293.217727	
762	1992605368	2E3.13.23.131.6359	
R9 43	2238575432	2E3.179.461.3391	
763	2004732340	2E2.5.13.227.33967	
R9 43	2549153612	2E2.71.151.59443	
764	2008888310	2.11.13.5.23.103.593	
R9 43	2474566666	2.11.13.43.311.647	
765	2026348300	2E2.271.5E2.23.3251	
R9 X	2580356852	2E2.271.61.39023	
766	2033951985	3E3.5.41.13.23.1229	
R9 33	2131910415	3E3.5.41.17.139.163	
767	2037127365	3E2.7.13.5.23.43.503	
R9 42	2612381499	3E2.7.13.1511.2111	
768	2040024987	3E3.7E2.11.13.41.263	
L1 32	2207122533	3E3.7E2.11.43.3527	
769	2043906130	2.5.7E3.179.3329	
R9 X	2271773870	2.5.29.73.239.449	
770	2049829364	2E2.11.19.263.9323	
R9 33	2085551116	2E2.11.47.59.17093	
771	2057011288	2E3.17.19.431.1847	
R9 43	2254003112	2E3.83.127.26729	
772	2067555105	3E3.5.7.11.198899	
R9 33	2515100895	3E3.5.47.389.1019	
773	2070206050	2.5E2.11.239.15749	
R9 33	2148273950	2.5E2.19.359.6299	
774	2083300808	2E3.23.43.179.1471	
R9 33	2113665592	2E3.23.137.191.439	
775	2083894785	3E2.5.7E3.79.1709	
R9 X	2184265215	3E2.5.11.37.239.499	
776	2084019740	2E2.5.11.107.223.397	
R9 52	2768701924	2E2.647.1069823	
777	2091376035	3E2.5.7.29.179.1279	
R9 44	2221711965	3E2.5.11.59.127.599	
778	2099037232	2E4.37.89.39839	
L2 33	2124799568	2E4.59.113.19919	
779	2099442345	3.5.7.11.13.37.3779	
L1 41	2533809495	3.5.7.24131519	
780	2107566279	3E2.7.13.17.19.31.257	
R9 43	2219898681	3E2.7.13.11.239.1031	

781	2110489384	2E3.23.29.137.2887
L1 32	2193785816	2E3.23.359.33211
782	2115211995	3E3.5.13.17.31.2287
R9 31	2312891685	3E3.5.13.1317887
783	2125619990	2.5.17.13.41.23459
L1 32	2343791530	2.5.17.3331.4139
784	2128669790	2.5.13.17.179.5381
L1 32	2265625570	2.5.13.2339.7451
785	2140484535	3E4.7.23.5.17.1931
R9 32	2707011657	3E4.7.23.251.827
786	2141689095	3E2.7.13.5.31.16871
R9 33	2574912249	3E2.7.13.47.151.443
787	2152573605	3E2.7.13.37.5.14207
L1 22	2564027739	3E2.7.13.37.191.443
788	2153378296	2E3.29.31.227.1319
R9 43	2180445704	2E3.17.911.17599
789	2154386325	3.5E2.7.13.479.659
R9 33	2245332075	3.5E2.7.43.79.1259
790	2158256590	2.7.5.17.151.12011
R9 44	2574279218	2.7.37.41.53.2287
791	2158771095	3E4.5.17.13.89.271
R9 32	2319893865	3E4.5.17.59.5711
792	2172649216	2E8.257.33023
L1 21	2181168896	2E8.8520191
793	2198463784	2E3.379.11.29.2273
R9 32	2467784216	2E3.379.179.4547
794	2201899310	2.5.31.13E3.53.61
R9 X	2387806930	2.5.31.29.265607
795	2220015735	3E3.5.7.79.131.227
R9 44	2402729865	3E3.5.31.37.59.263
796	2221700481	3E4.7.11E2.13.47.53
R9 32	2450161791	3E4.7.11E2.71.503
797	2221834450	2.5E2.11.1049.3851
L1 32	2291939150	2.5E2.17.2696399
798	2223111345	3.5.7.13E3.23.419
R9 X	2383045455	3.5.7.19.251.4759
799	2232676016	2E4.19.2551.2879
L1 33	2324175184	2E4.127.263.4349
800	2241281620	2E2.5.131.881.971
R9 43	2511611756	2E2.17.47.785861
801	2246508224	2E6.227.239.647
R9 32	2256728896	2E6.179.196991
802	2264629070	2.5.11.101.103.1979
R9 33	2272200370	2.5.11.79.373.701
803	2265070275	3E2.5E2.13.19.53.769
R9 32	2426816925	3E2.5E2.13.659.1259
804	2270966698	2.7.11.13.191.5939
L1 33	2327448662	2.7.11.19.307.2591
805	2278422088	2E3.19.53.151.1873
R9 32	2336115512	2E3.19.1367.11243
806	2278650296	2E3.13.23.199.4787
R9 43	2547653704	2E3.113.839.3359
807	2282361092	2E2.11.19.239.11423
R9 44	2323795708	2E2.13.23.127.15299
808	2294183672	2E3.11.227.114847
L1 33	2419178248	2E3.31.151.64601
809	2298420670	2.7.5.13.197.12821
B4 42	2819711426	2.7.17.11847527
810	2300473575	3E3.5E2.31.17.29.223
L1 32	2499219225	3E3.5E2.31.83.1439
811	2310786764	2E2.11.13.19.149.1427
R9 54	2727197236	2E2.29.79.139.2141
812	2317392152	2E3.19.47.227.1429
R9 32	2377583848	2E3.19.3761.4159
813	2331923265	3E2.5.7.89.223.373
W1 32	2372936895	3E2.5.7.1427.5279
814	2332981816	2E3.11.23.283.4073
R9 42	2665327304	2E3.6983.47711
815	2359263375	3E3.5E3.7.37.2699
R9 32	2762528625	3E3.5E3.449.1823
816	2363563444	2E2.19.11.23.83.1481
R9 43	2655792716	2E2.19.47.233.3191
817	2378640285	3E2.5.7.103.167.439
W1 32	2418472035	3E2.5.7.839.9151
818	2379890150	2.5E2.31.11.97.1439
R9 X	2659787290	2.5.31.83.167.619
819	2402498475	3E5.5E2.13.29.1049
R9 X	2573745525	3E2.5E2.13.587.1499
820	2402562825	3E2.5E2.13.17.19.2543
L1 X	2764606455	3E2.5.13.929.5087
821	2407445150	2.5E2.11.29.149.1013
R9 43	2684862850	2.5E2.59.449.2027
822	2410351540	2E2.5.83.887.1637
R9 44	2721279692	2E2.17.73.293.1871
823	2417154916	2E2.11.23.47.89.571
R9 43	2564461724	2E2.11.107.127.4289
824	2419787565	3E2.5.13.17.23.71.149
R9 43	2675047635	3E2.5.13.89.191.269
825	2421696130	2.7E2.5.31.131.1217
R9 X	2856901502	2.7.13.1367.11483
826	2428035470	2.5.7.53.359.1823
R9 44	2677997170	2.5.29.71.113.1151
827	2436224288	2E5.53.307.4679
R9 33	2467554592	2E5.167.389.1187
828	2440775024	2E4.29.83.63377
L1 X	2510314336	2E5.557.140839
829	2440883588	2E2.11.13.83.51413
R9 X	2637996988	2E2.11E2.1721.3167
830	2441219715	3E4.5.11.47.89.131
R3 32	2526711165	3E4.5.11.197.2879
831	2446241032	2E3.19.61.193.1367
W1 32	2490050168	2E3.19.227.72167
832	2448784550	2.5E2.31.17.199.467
R9 X	2565180250	2.5E3.31.89.3719
833	2450252385	3E2.5.7.107.139.523
W1 32	2493624735	3E2.5.7.1571.5039
834	2481907330	2.5.7E2.263.19259
L1 X	2734933310	2.5.17.1319.12197
835	2482324910	2.5.13.23.41.20249
R9 44	2661499090	2.5.17.149.179.587
836	2484011608	2E3.13.151.367.431
R9 44	2590502312	2E3.37.127.137.503
837	2498633150	2.5E2.13.149.25799
R9 33	2540106850	2.5E2.17.139.21499
838	2502894550	2.5E2.43.13.149.601
R9 X	2670211850	2.5E2.43.79E2.199
839	2509841530	2.5.31.7.311.3719
W1 32	2838387590	2.5.31.71.128959
840	2511601365	3.5.7.13.53.149.233
W1 32	2583233835	3.5.7.13.971.1949
841	2517082425	3E3.5E2.11.13.89.293
R9 42	2995064775	3E3.5E2.587.7559
842	2550651220	2E2.5.13.131.74887
R9 43	3261855788	2E2.73.223.50093
843	2551781890	2.5.7.19.61.71.443
R9 53	3156424190	2.5.431.739.991
844	2555923990	2.5.17.23.29.22541
R9 33	2702673770	2.5.17.59.467.577
845	2592552904	2E3.17.29.43.15287
R9 43	2856090296	2E3.103.131.26459
846	2611143964	2E2.11.13E2.251.1399
R9 X	2812097636	2E2.17.29.167.8539
847	2612831949	3E2.7E2.13.19.17E2.83
L1 X	2737662291	3E2.7E2.13.19.41.613
848	2614326776	2E3.17.61.79.3989
R9 44	2729081224	2E3.37.107.199.433
849	2624170185	3E2.7.13.5.53.107.113
R9 X	3183941943	3E2.7E2.13.127.4373
850	2631762064	2E4.29.53.103.1039
R9 42	2800033136	2E4.809.216319
851	2648872395	3E3.5.23.13.137.479
R9 33	2692721205	3E3.5.23.17.139.367
852	2655265756	2E2.11.13.199.23327
R9 45	2831479844	2E2.29.41.47.53.239
853	2671748950	2.5E2.31.13.67.1979
R3 X	2937892010	2.5.31.43.433.509
854	2672087608	2E3.17.29.37.18311
L1 42	2964345992	2E3.71.5218919
855	2682405256	2E3.19.107.131.1259
R9 44	2706362744	2E3.31.53.109.1889
856	2688000928	2E5.71.107.11057
R9 33	2729180576	2E5.193.647.683
857	2702347270	2.7.5.1607.24023
R9 X	2860457978	2.7.17.29E2.31.461
858	2710037704	2E3.11.29.181.5867
R9 43	3057032696	2E3.233.719.2281
859	2710902590	2.5.11.23.397.2699
R9 44	2859823810	2.5.17.59.239.1193
860	2724296672	2E5.53.79.20333
L2 32	2809804768	2E5.2591.33889
861	2724801970	2.5.19.11.47.27739
L1 32	3027364430	2.5.19.359.44383
862	2732700555	3E2.5.13.19.47.5231
R9 33	2752109685	3E2.5.13.17.127.2179
863	2733105848	2E3.11.139.223439
L1 33	2897582152	2E3.31.251.46549
864	2750817650	2.5E2.7.599.13121
R9 33	3106843150	2.5E2.89.809.863
865	2766512710	2.5.13.29.733823
W1 23	2781196730	2.5.13.53.103.3919
866	2784657488	2E4.29.71.181.467
R9 43	2918727472	2E4.223.269.3041
867	2787570220	2E2.5.31.601.7481
R9 43	3266026196	2E2.17.4987.9631
868	2794450516	2E2.11.13.197.24799
R9 33	2980179884	2E2.11.79.659.1301
869	2796129128	2E3.13.17.887.1783
R9 42	3192116632	2E3.1997.199807
870	2807410016	2E5.47.643.2903
R9 33	2848002208	2E5.197.367.1231
871	2808979976	2E3.11.2393.13339
R9 34	2939492824	2E3.37.137.173.419
872	2816751938	2.7.11.13.19.74051
R9 33	3154801342	2.7.11.167.241.509
873	2828720510	2.7E2.5.11.83.6323
R9 X	3711610882	2.7.53.113.44267
874	2840437756	2E2.19.13E2.37.43.139
R9 X	3156691844	2E2.19.41.151.6709
875	2842515016	2E3.127.11.167.1523
R9 32	3056462264	2E3.127.47.64007
876	2847780584	2E3.11.557.58099
R9 34	2987783416	2E3.53.61.331.349
877	2848466620	2E2.5.17.31.131.2063
R9 53	3742595396	2E2.257.431.8447
878	2870595525	3.5E2.7.19.41.7019
R9 33	2979030075	3.5E2.7.29.389.503
879	2873321512	2E3.19.113.131.1277
W1 32	2896081688	2E3.19.107.178067
880	2874527150	2.5E2.11.137.38149
L1 32	3000878050	2.5E2.19.3158819
881	2881000792	2E3.23.41.521.733
R9 43	2912196968	2E3.17.503.42571
882	2894107455	3E3.5.17.19.31.2141
R9 33	3028094145	3E3.5.17.47.67.419
883	2896764608	2E6.53.853999
L1 X	2959967392	2E5.199.464819
884	2897960164	2E2.11E2.23.439.593
R9 33	2941867676	2E2.11E2.59.71.1451
885	2919883365	3E2.5.7.17.269.2027
R9 43	3230310555	3E2.5.19.23.164267
886	2931524416	2E6.79.569.1019
W1 32	2975499584	2E6.2719.17099
887	2932637168	2E4.37.67.107.691
R3 43	3054015376	2E4.101.683.2767
888	2935281375	3E3.5E3.13.149.449
L1 21	2961518625	3E3.5E3.13.67499
889	2944703025	3E3.5E2.11.17.41.569
R9 42	3467386575	3E3.5E2.151.34019
890	2952121352	2E3.61.19.29.10979
W1 32	3174718648	2E3.61.79.82349
891	2953084864	2E6.101.461.991
L1 32	2983785152	2E6.373.124991
892	2957909284	2E2.11.19.43.107.769
R9 43	3189277916	2E2.11.197.263.1399
893	2960375535	3E2.5.13E2.31.29.433
R9 X	2986743825	3E2.5E2.13.31.32939
894	2978701744	2E4.19.971.10091
L2 33	3103141136	2E4.173.179.6263
895	2982855752	2E3.19.47.239.1747
R9 32	3058232248	2E3.19.1279.15731
896	2995106895	3E3.5.19E2.11.37.151
L1 32	3342782385	3E3.5.19E2.113.607
897	2995750730	2.5.7E2.1223.4999
R9 X	3283369270	2.5.29.37.305999
898	2997567034	2.7.11.19.47.71.307
R9 43	3133653446	2.7.11.23.479.1847
899	3000210675	3.5E2.19.37.7.11.739
R9 32	3694598925	3.5E2.19.37.79.887
900	3000833115	3.5.7.17.19.23.3847
R9 X	3382537125	3.5E3.11.47.73.239

```
  901 3001624450 2.5E2.11.47.83.1399
R9 43 3297972350 2.5E2.41.449.3583
  902 3009763264 2E6.83.443.1279
W1 32 3053074496 2E6.1439.33151
  903 3020065808 2E4.19.223.44549
L1 33 3167038192 2E4.197.349.2879
  904 3024860410 2.5.11.13.23.91969
R9 43 3649954310 2.5.67.1259.4327
  905 3034523630 2.5.23.17.19.40847
R9 33 3318157330 2.5.23.73.229.863
  906 3036257456 2E4.19.439.22751
L1 33 3170488144 2E4.157.263.4799
  907 3037569344 2E6.101.311.1511
L1 32 3073402432 2E6.503.95471
  908 3054330279 3E2.7E3.13.11E2.17.37
R9 X  3568431321 3E3.7E2.13.207479
  909 3065342660 2E2.5.9743.15731
R9 34 3372946876 2E2.13.107.347.1747
  910 3071356244 2E2.23.229.11.29.457
R9 32 3299606956 2E2.23.229.19.8243
  911 3101299916 2E2.11.13.113.47981
R9 X  3331358932 2E2.11E2.263.26171
  912 3105174904 2E3.13E2.2296727
R9 X  3199343456 2E5.1097.91139
  913 3107420056 2E3.13.19.331.4751
R9 43 3518768744 2E3.461.719.1327
  914 3123806972 2E2.11.13.431.12671
R9 33 3313974532 2E2.11.83.191.4751
  915 3124943756 2E2.11.19.1259.2969
L1 33 3161952244 2E2.11.29.149.16631
  916 3135932032 2E7.101.107.2267
R9 X  3235061408 2E5.3671.27539
  917 3138655065 3.5.7E2.13.29.47.241
R9 X  3535433895 3.5.7.41.131.6269
  918 3143417344 2E9.89.101.683
R9 X  3280122416 2E4.113.659.2753
  919 3152378344 2E3.23.31.419.1319
R9 43 3234309656 2E3.19.2687.7919
  920 3188153956 2E2.13.17.31.317.367
R9 54 3417616796 2E2.11.137.211.2687
  921 3202734465 3E3.5.7.17.31.59.109
R9 52 4096337535 3E3.5.439.69119
  922 3216365570 2.5.11.47.769.809
R9 33 3250156030 2.5.11.107.461.599
  923 3232160384 2E7.173.227.643
R9 X  3282775456 2E5.229.347.1291
  924 3254018625 3E2.5E3.13.11.113.179
R9 X  3737227455 3E2.5.13.479.13337
  925 3260154664 2E3.13E3.251.739
R9 X  3397181336 2E3.29.97.150959
  926 3274564293 3E3.7.11.13.17.7127
R9 33 3623058747 3E3.7.11.53.131.251
  927 3276399555 3E2.5.13.11.29.97.181
R9 42 3735288765 3E2.5.13.179.35671
  928 3279018015 3E2.7E2.13.5.73.1567
L1 32 3943277793 3E2.7E2.13.83.8287
  929 3293577950 2.5E2.31.13.149.1097
L1 32 3568482850 2.5E2.31.853.2699
  930 3312096496 2E4.29.661.10799
L1 33 3337031504 2E4.59.89.39719

  931 3331018845 3E2.7.5.11.17.193.293
R9 53 4356521379 3E2.7.23.41.73331
  932 3334417196 2E2.11.17.53.241.349
R9 43 3581168404 2E2.11.109.769.971
  933 3341224575 3E2.5E2.13.19.59.1019
L1 32 3564583425 3E2.5E2.13.239.5099
  934 3359556915 3.5.11.17.13E2.19.373
R9 X  3736509645 3.5.11E3.17.101.109
  935 3370176315 3E4.11.5.23.31.1061
R9 43 3735470277 3E4.11.7.47.12743
  936 3373569544 2E3.41.31.71.4673
R9 33 3410834936 2E3.41.37.127.2213
  937 3381430228 2E2.11.19.41.47.2099
R3 54 3731017772 2E2.23.31.89.14699
  938 3382872670 2.5.19.17.179.5851
R9 33 3442900130 2.5.19.23.461.1709
  939 3393478725 3.5E2.7.13.47.71.149
R9 42 3806060475 3.5E2.7.1049.6911
  940 3396934125 3E3.5E3.13.139.557
R9 X  3427629075 3E3.5E2.13.167.2339
  941 3401192925 3E2.5E2.13.41.79.359
R9 33 3423370275 3E2.5E2.13.59.83.239
  942 3407059832 2E3.11.911.42499
L1 33 3569740168 2E3.37.67.179999
  943 3408254632 2E3.23.47.229.1721
R9 33 3435662168 2E3.23.71.409.643
  944 3411757220 2E2.173.5.691.1427
W1 32 3809832988 2E2.173.13.423503
  945 3414281456 2E4.19.163.68903
L1 33 3591877264 2E4.263.409.2087
  946 3415139192 2E3.19.47.71.6733
R9 43 3566672008 2E3.23.2729.7103
  947 3425919050 2.5E2.17.103.109.359
R9 44 3468282550 2.5E2.29.59.71.571
  948 3431450912 2E5.43.1439.1733
R9 33 3490122208 2E5.269.373.1087
  949 3434398695 3E2.7.13.5.191.4391
R9 33 3932355609 3E2.7.13.23.107.1951
  950 3437107245 3E2.5.13.11E2.59.823
R9 X  3743360595 3E3.5.13.617.3457
  951 3437839568 2E4.29.659.11243
L1 33 3463727632 2E4.59.89.41227
  952 3437861427 3E3.7.11.13.131.971
R9 33 3459761613 3E3.7.11.17.53.1847
  953 3443251432 2E3.23.29.127.5081
R9 44 3582105368 2E3.43.83.109.1151
  954 3443961465 3E2.5.23.7.53.8969
R9 32 3810113415 3E2.5.23.19.193751
  955 3445207395 3.5.7E2.19.29.47.181
R9 X  3725301405 3.5.7.19.1867319
  956 3452049632 2E5.43.263.9539
L1 32 3529398688 2E5.211.522719
  957 3459581824 2E7.97.278639
R9 X  3503631776 2E5.139.773.1019
  958 3474708976 2E4.67.109.131.227
R9 43 3503951504 2E4.37.1583.3739
  959 3475340505 3E3.5.7.13E2.47.463
R9 X  4350149415 3E3.5.127.487.521
  960 3481924064 2E5.71.103.14879
L1 32 3537626656 2E5.127.870479

  961 3502908585 3E4.5.11.37.79.269
R9 32 3647901015 3E4.5.11.599.1367
  962 3513278192 2E4.41.43.59.2111
R9 42 3746257168 2E4.7919.29567
  963 3554097885 3E3.5.13E3.23.521
R9 X  3601895715 3E3.5.11.41.59159
  964 3554318372 2E2.11E3.19.41.857
R9 X  3831620188 2E2.11.103.845459
  965 3564199504 2E4.47.101.167.281
R9 32 3626340272 2E4.47.503.9587
  966 3572444816 2E4.43.97.199.269
R9 43 3645843184 2E4.71.131.24499
  967 3597402050 2.5E2.11.19.344249
R9 33 4086257950 2.5E2.149.269.2039
  968 3602732595 3.5.19.7E2.11.47.499
R9 X  4276947405 3.5.19.23.29.149.151
  969 3604491345 3.5.7.13.23.29.37.107
R9 52 4338226095 3.5.7.809.51071
  970 3611920304 2E4.29.593.13127
L1 33 3640249456 2E4.53.109.39383
  971 3647464821 3E2.7.13.11.23.29.607
R9 X  4001077899 3E2.7E2.13.31.47.479
  972 3647562568 2E3.13.17.839.2459
R9 42 4163429432 2E3.1721.302399
  973 3654203576 2E3.19.71.571.593
R9 43 3684785224 2E3.17.311.87119
  974 3658862632 2E3.23.41.53.9151
R9 43 3813562328 2E3.43.47.235871
  975 3663942220 2E2.5.71.2580241
L1 33 4138709588 2E2.13.3163.25163
  976 3679922740 2E2.5.13.67.211247
R9 43 4766617292 2E2.83.3671.3911
  977 3680156392 2E3.101.11.41.10099
W1 32 4108155608 2E3.101.1009.5039
  978 3685361368 2E3.13E2.47.59.983
R9 X  4093749032 2E3.79.2213.2927
  979 3693013664 2E5.41.131.21487
L1 31 3812143072 2E5.119129471
  980 3710119780 2E2.227.5.17.53.907
R9 42 4741427996 2E2.227.71.73547
  981 3715799048 2E3.13.53.223.3023
R9 44 3965644792 2E3.71.97.167.431
  982 3736912936 2E3.17.43.639007
L1 33 3854502104 2E3.23.151.138731
  983 3737773292 2E2.31.11.61.167.269
R9 44 3821742868 2E2.31.17.53.79.433
  984 3743928045 3E2.5.13.11.223.2609
R9 33 3917194515 3E2.5.13.23.347.839
  985 3751290650 2.5E2.19.29.136163
L1 33 3846660550 2.5E2.17.349.12967
  986 3762853094 2.7.11.13.373.5039
R9 33 3837305626 2.7.11.19.167.7853
  987 3787638940 2E2.37.5.5118431
W1 23 4381378532 2E2.37.43.73.9431
  988 3797392550 2.5E2.7.107.101399
L1 X  4350300250 2.5E3.3719.4679
  989 3804416572 2E2.11.43.71.127.223
R9 43 3825546692 2E2.11.31.83.33791
  990 3804517244 2E2.11.17.367.13859
R9 33 3907408516 2E2.11.31.809.3541

  991 3833109376 2E7.71.197.2141
R9 X  3953660384 2E5.2753.44879
  992 3846301096 2E3.11.59.727.1019
R9 43 4173346904 2E3.79.83.79559
  993 3848313645 3E4.5.11E5.59
R9 X  3868601715 3E4.5.11E2.89.887
  994 3865930695 3E2.5.11.29.43.6263
L1 22 3873366585 3E2.5.11.29.47.5741
  995 3868964990 2.5.11.43.509.1607
W1 32 3925075330 2.5.11.89.400927
  996 3877164568 2E3.17.101.277.1019
W1 32 3932077832 2E3.17.5003.5779
  997 3892163756 2E2.13.19.53.239.311
R9 43 4033135444 2E2.13.29.127.21059
  998 3900906009 3E2.7.13.11.41.59.179
R9 44 4024393191 3E2.7.13.23.29.53.139
  999 3905117576 2E3.19.47.71.7699
R9 43 4078242424 2E3.23.2399.9239
 1000 3905322225 3.5E2.7.19.53.83.89
R9 X  4194159375 3.5E5.7.79.809
 1001 3925579070 2.5.7.89.191.3299
R9 44 4285876930 2.5.19.199.263.431
 1002 3940697128 2E3.19.53.163.3001
R9 32 4035016472 2E3.19.683.38867
 1003 3949406848 2E7.211.349.419
R9 X  3997413152 2E5.139.499.1801
 1004 3956965155 3E3.5.11.13E2.15767
R9 X  4353401565 3E3.5.17.71.26717
 1005 3961085625 3E3.5E4.7.33533
R9 X  4419731655 3E3.5.17.137.14057
 1006 3963477872 2E4.41.43.71.1979
R9 42 4203499408 2E4.359.731807
 1007 3971606470 2.5.13E2.17.138239
R9 X  4224919610 2.5.19.71.107.2927
 1008 3980355350 2.5E2.17.59.139.571
R9 44 4062879850 2.5E2.23.131.149.181
 1009 3986534090 2.5.929.7.11.5573
L1 31 4971106870 2.5.929.535103
 1010 4000783984 2E4.43.113.51461
L1 X  4001351168 2E9.1367.5717
 1011 4007609528 2E3.13.29.1328783
R9 33 4363729672 2E3.61.151.59219
 1012 4023332270 2.5.19.23.37.149.167
R9 43 4250331730 2.5.19.47.179.2659
 1013 4028769225 3E3.5E2.13.17.113.239
R9 43 4520683575 3E3.5E2.41.379.431
 1014 4029072075 3E2.5E2.7.19.134639
R9 X  4652515125 3E3.5E3.109.12647
 1015 4032465344 2E6.107.191.3083
W1 32 4089162304 2E6.1151.55511
 1016 4048940048 2E4.17.1451.10259
R9 33 4263876112 2E4.241.683.1619
 1017 4049815250 2.5E3.13.43.28979
L1 X  4304770990 2.5.13.857.38639
 1018 4053148088 2E3.79.11.583019
W1 23 4342339912 2E3.79.107.157.409
 1019 4056852735 3E3.5.19.13.89.1367
R9 33 4216811265 3E3.5.19.29.83.683
 1020 4063895408 2E4.19E2.449.1567
R9 X  4269946192 2E4.179.839.1777
```

1021	4088056208	2E4.41.53.307.383
R9 43	4227411568	2E4.71.1231.3023
1022	4095021315	3.5.7.11.23.139.1109
R9 43	4497977085	3.5.7.31.83.16649
1023	4104095930	2.5.11.47.139.5711
R9 44	4186986310	2.5.13.89.101.3583
1024	4105247230	2.7.31.5.23.83.991
R9 43	5110162946	2.7.31.71.383.433
1025	4109466950	2.5E2.31.17.83.1879
R9 X	4349991610	2.5.31.23.433.1409
1026	4123833752	2E3.17.53.61.83.113
R9 53	4532487208	2E3.71.227.35153
1027	4141715570	2.5.19.23E2.89.463
R9 X	4171865230	2.5.13.47.157.4349
1028	4143353656	2E3.13.29.509.2699
R9 43	4531746344	2E3.53.499.21419
1029	4144376145	3.5.7E2.13.41.71.149
R9 43	4542971055	3.5.7E2.53.139.839
1030	4149106335	3E4.5.11E3.43.179
L1 21	4268776545	3E4.5.11E3.7919
1031	4150593232	2E4.43.61.98899
L1 22	4213181968	2E4.43.859.7129
1032	4152981844	2E2.11E2.23.53.7039
R9 X	4341313196	2E2.11.43.797.2879
1033	4161910012	2E2.53.211.13.17.421
L1 32	4360072772	2E2.53.211.11.8861
1034	4186831005	3E3.5.7.67.89.743
R9 43	4555466595	3E3.5.23.29.50591
1035	4189882288	2E4.17.2399.6421
R9 33	4410460112	2E4.239.569.2027
1036	4210837424	2E4.23.109.113.929
R9 42	4465839376	2E4.359.777479
1037	4211873505	3E3.5.7.17.23.11399
R9 43	5243742495	3E3.5.89.607.719
1038	4242143750	2.5E5.13.109.479
R9 X	4419801850	2.5E2.19.1567.2969
1039	4261080915	3E2.7E2.13.5.43.3457
R3 32	5209468173	3E2.7E2.13.227.4003
1040	4280119305	3.5.7.11.59.107.587
R9 44	4498673655	3.5.7.31.53.89.293
1041	4281566032	2E4.29.97.251.379
R9 43	4446000368	2E4.113.239.10289
1042	4282854730	2.5.7.11.761.7309
R9 42	5342485430	2.5.1087.491489
1043	4288758056	2E3.11.4513.10799
R9 34	4486457944	2E3.47.73.149.1097
1044	4312833832	2E3.29.31.521.1151
R9 33	4346519768	2E3.29.47.191.2087
1045	4313390445	3E2.7.13.5.23.41.1117
R9 42	5531592339	3E2.7.13.1031.6551
1046	4321518201	3E2.7E2.13.11.17.29.139
R9 X	5089774599	3E2.7E3.13.53.2393
1047	4331452790	2.7.41.5.47.163.197
R9 43	5095298698	2.7.41.23.107.3607
1048	4346372745	3E2.11.13.17.5.67.593
R9 32	5180969079	3E2.11.13.17.43.5507
1049	4355468325	3E2.5E2.13.19.109.719
R9 32	4581459675	3E2.5E2.13.89.17599
1050	4373598075	3.5E2.11.7.17.44549
W3 32	5172219525	3.5E2.11.43.145799
1051	4377238047	3E2.7.13.17.29.37.293
R9 X	4406635233	3E2.7.13.11E2.53.839
1052	4377991936	2E8.293.58367
L1 22	4390866176	2E8.3583.4787
1053	4396203070	2.5.7E2.107.191.439
R9 X	4964856770	2.5.31.131.179.683
1054	4400527095	3E5.5.17.23.59.157
R9 43	4543739145	3E5.5.11.359.947
1055	4414931650	2.5E2.31.23.59.2099
R9 33	4584492350	2.5E2.31.89.167.199
1056	4416880923	3E2.7E2.13.19.23.41.43
R2 32	4785272037	3E2.7E2.13.19.197.223
1057	4429428675	3.5E2.7.19.167.2659
L1 22	4436670525	3.5E2.7.19.239.1861
1058	4458625504	2E5.37.269.13999
L1 32	4590694496	2E5.797.179999
1059	4488453968	2E4.17.2351.7019
R9 33	4724706352	2E4.223.701.1889
1060	4490950220	2E2.5.71.3162641
L1 33	5072879188	2E2.13.3083.31643
1061	4516391295	3E2.5.13.19.59.71.97
R9 43	4729791105	3E2.5.13.29.83.3359
1062	4522539070	2.5.7.17.73.79.659
R9 53	5604923330	2.5.593.739.1279
1063	4569376424	2E3.19.43.83.8423
R9 43	4771154776	2E3.23.1871.13859
1064	4570182110	2.5.13.23.479.3191
R9 44	4696321570	2.5.17.37.127.5879
1065	4582247428	2E2.11.29.79.131.347
R9 32	4678450172	2E2.11.29.463.7919
1066	4589689390	2.5.11.13.167.19219
R9 X	5174685650	2.5E2.79.881.1487
1067	4594486048	2E5.53.463.5851
R9 33	4643059808	2E5.173.223.3761
1068	4604839810	2.5.19.17.37.53.727
R9 42	5075347070	2.5.19.151.176903
1069	4617085725	3E3.5E2.7.53.103.179
R9 X	5410843875	3E3.5E3.479.3347
1070	4634941234	2.7.11.17.37.59.811
R9 X	4962509006	2.7E2.13.47.179.463
1071	4667500708	2E2.19.13.97.113.431
R9 43	4792055132	2E2.19.17.83.44687
1072	4671243424	2E5.43.3394799
W1 23	4739142176	2E5.229.263.2459
1073	4702051046	2.7.23.11E2.17.31.229
R9 X	5446976794	2.7.23.29.151.3863
1074	4709813710	2.5.7.1307.51479
R9 X	4986547250	2.5E3.47.59.7193
1075	4721483056	2E4.23.139.241.383
R9 43	4957897424	2E4.197.439.3583
1076	4754422208	2E6.157.269.1759
R9 32	4780940992	2E6.197.379199
1077	4763730208	2E5.17.1949.4493
L1 X	5173851992	2E3.41.15773939
1078	4771436296	2E3.11.23.271.8699
R9 42	5451411704	2E3.7649.89087
1079	4784209576	2E3.19.23.29.47189
L1 42	5408830424	2E3.197.3431999
1080	4785332175	3E5.5E2.13E2.59.79
R9 X	5126533425	3E2.5E2.13.479.3659
1081	4796703664	2E4.43.67.104059
L1 22	4855069456	2E4.43.373.18919
1082	4800749954	2.7.11.13.73.107.307
R9 43	5124163198	2.7.11.43.83.9323
1083	4802570325	3E3.5E2.7.293.3469
L1 X	5317615275	3.5E2.7.139.72869
1084	4839564015	3E2.5.13.11.61.12329
R9 X	5177919825	3E2.5E2.13.359.4931
1085	4842186615	3E3.5.7E2.359.2039
R9 X	5204405385	3E3.5.23.37.89.509
1086	4859601232	2E4.17.2939.6079
R9 33	5114760368	2E4.227.599.2351
1087	4863771495	3E3.5.11.43.59.1291
R9 32	4959562905	3E3.5.11.47.71059
1088	4875810975	3E2.5E2.31.7.37.2699
R9 32	5709225825	3E2.5E2.31.449.1823
1089	4878141590	2.7E2.5.233.42727
R9 33	5380167562	2.7E2.11.653.7643
1090	4893008692	2E2.11.109.13.78479
L1 22	5259164108	2E2.11.109.839.1307
1091	4900571656	2E3.19.71.83.5471
R9 32	5027825144	2E3.19.2267.14591
1092	4903965044	2E2.11.17.1129.5807
R9 33	5019351436	2E2.11.29.1451.2711
1093	4911038510	2.5.7.149.479.983
R9 44	5291073490	2.5.29.31.409.1439
1094	4931246565	3E2.5.7E2.29.67.1151
R9 X	5517209115	3E2.5.11.683.16319
1095	4937340976	2E4.37.47.61.2909
R9 42	5264327504	2E4.5471.60139
1096	4960116850	2.5E2.13.89.179.479
R9 43	5164235150	2.5E2.19.863.6299
1097	4960585125	3E3.5E3.31.17.2789
R9 X	5067344475	3E3.5E2.31.23.10529
1098	4967430490	2.5.19.11.139.17099
R9 33	5374649510	2.5.19.113.167.1499
1099	4980118690	2.5.31.19.61.83.167
R9 43	5099236190	2.5.31.17.223.4339
1100	4999722525	3E2.5E2.7.17.29.47.137
R9 X	6532396515	3E2.5.59.863.2851
1101	5001083252	2E2.11.19.1583.3779
R9 34	5057950348	2E2.11.59.107.131.139
1102	5032905345	3E2.5.13E2.61.19.571
L1 X	5091357375	3E2.5E3.13E2.61.439
1103	5047072690	2.5.11.37.743.1669
R9 X	5151203150	2.5E2.17.191.31729
1104	5048426630	2.5.13.23.563.2999
R9 44	5184789370	2.5.17.31.349.2819
1105	5060442170	2.5.7E2.31.79.4217
R9 X	6018387910	2.5.73.113.72959
1106	5063925616	2E4.43.71.83.1249
R9 43	5247914384	2E4.79.769.5399
1107	5088028550	2.5E2.11.499.18539
R9 33	5257291450	2.5E2.19.199.27809
1108	5088398630	2.5.7E2.1319.7873
R9 X	5575517050	2.5E2.37.1187.2539
1109	5113096443	3E2.7E2.13.17.23.2281
R9 33	5113841733	3E2.7E2.13.11.83.977
1110	5118127490	2.7.5.37.167.11833
R9 X	5760821374	2.7.11E2.487.6983
1111	5131883330	2.5.7.17.103.149.281
R9 53	6270843070	2.5.107.1879.3119
1112	5156687470	2.5.11.53.419.2111
R9 33	5189747090	2.5.11.131.139.2591
1113	5157409576	2E3.11.37.179.8849
R9 43	5738710424	2E3.113.269.23599
1114	5164511625	3E2.7.13.5E3.61.827
R9 X	6495742071	3E2.7.13.103.77003
1115	5188836656	2E4.59.61.251.359
R9 43	5272993744	2E4.53.199.31247
1116	5191917776	2E4.17.167.114299
L1 32	5523021424	2E4.761.453599
1117	5200086344	2E3.17.269.307.463
R9 44	5218198456	2E3.19.131.503.521
1118	5200799264	2E5.53.1439.2131
R9 33	5243612896	2E5.107.491.3119
1119	5221345844	2E2.11.13.19.353.1361
R9 53	6118775116	2E2.17.9439.9533
1120	5228978728	2E3.17E2.53.139.307
R9 X	5493671672	2E3.41.89.307.613
1121	5257013762	2.7.11.43.13.79.773
R9 32	5728089598	2.7.11.43.839.1031
1122	5290961056	2E5.67.199.12401
R9 33	5335072544	2E5.149.211.5303
1123	5296175750	2.5E3.17.29.97.443
R9 X	5700176890	2.5.19.83.181.1997
1124	5301374925	3.5E2.11.7E2.199.659
R9 X	5894337075	3.5E2.11.23.113.2749
1125	5302349776	2E4.17.2267.8599
R9 33	5581328624	2E4.257.449.3023
1126	5319472184	2E3.13.41.199.6269
R9 43	5740807816	2E3.37.3079.6299
1127	5321930128	2E4.29.53.379.571
R9 43	5593889072	2E4.197.569.3119
1128	5325459184	2E4.43.139.233.239
R9 43	5398854416	2E4.41.1559.5279
1129	5375620496	2E4.29.83.97.1439
R9 43	5648673904	2E4.199.503.3527
1130	5381495288	2E3.13.23.191.11779
R9 43	6017775112	2E3.127.433.13679
1131	5389403950	2.5E2.7.1999.7703
R9 33	6074148050	2.5E2.79.641.2399
1132	5403806252	2E2.13.17.239.25577
L1 44	5424895828	2E2.11.23.521.10289
1133	5442123375	3E3.5E3.13.71.1747
R9 X	5552656785	3E3.5.13.37.233.367
1134	5444062533	3E2.7E2.13.19.23.41.53
R9 32	5849488827	3E2.7E2.13.19.83.647
1135	5444435745	3E2.5.7.61.67.4229
R9 X	5683780575	3E2.5E2.11.563.4079
1136	5447262776	2E3.23.47.83.7589
R9 33	5569774024	2E3.23.179.263.643
1137	5454702435	3.5.7.13.43.199.467
W1 32	5615556765	3.5.7.13.1319.3119
1138	5455059448	2E3.127.19E2.107.139
R9 X	5605522952	2E3.127.41.53.2539
1139	5477707264	2E9.59.149.1217
R9 X	5736418736	2E4.131.1049.2609
1140	5497064685	3E2.5.7.83.167.1259
R9 32	5598354195	3E2.5.7.3527.5039

1141	5502084136	2E3.17.199.263.773
R9 44	5532059864	2E3.31.53.89.4729
1142	5502767650	2.5E2.19.37.89.1759
W1 32	5692944350	2.5E2.19.227.26399
1143	5513127795	3E2.5.17.7.29.131.271
R9 42	6585084045	3E2.5.17.1087.7919
1144	5546461305	3.7.11.5.47.83.1231
R9 44	5898483591	3.7.11.13.17.43.2687
1145	5552366085	3E2.5.7.79.347.643
W1 32	5635304955	3E2.5.7.463.38639
1146	5562037616	2E4.43.59.263.521
R9 43	5716169104	2E4.71.241.20879
1147	5574272535	3E2.5.13.19.43.107.109
R9 43	5841932265	3E2.5.13.23.449.967
1148	5575354850	2.5E2.13.17.83.6079
R9 X	6393879070	2.5.41.139.151.743
1149	5579526590	2.5.11E2.89.197.263
R9 32	5682998530	2.5.11E2.659.7127
1150	5587409230	2.5.13.19.1451.1559
R9 33	5828795570	2.5.13.199.233.967
1151	5592854630	2.5.19.11.569.4703
R9 33	5990274970	2.5.19.71.167.2659
1152	5607553016	2E3.13.149.361871
R9 34	5791414984	2E3.41.59.139.2153
1153	5609702696	2E3.13.29.107.17383
R9 43	6218370904	2E3.89.317.27551
1154	5619401456	2E4.29.79.83.1847
R9 42	5929859344	2E4.191.1940399
1155	5640198165	3E2.5.19.7E2.61.2207
R9 X	6532594155	3E2.5.19.47.162563
1156	5668081984	2E6.223.311.1277
R9 33	5675159744	2E6.283.431.727
1157	5676646514	2.7.11E2.23.53.2749
R9 X	5699641486	2.7E2.11.41.43.2999
1158	5697735225	3.5E2.7.13.167.4999
L1 32	5968184775	3.5E2.7.29.391999
1159	5715251290	2.5.7.53.1540499
R9 34	6263676710	2.5.23.89.157.1949
1160	5725765580	2E2.5.17.467.36061
L1 43	7033258516	2E2.37.107.444131
1161	5745724875	3E4.11.5E3.23.2243
R9 X	6453305397	3E4.11.7.67.15443
1162	5747841099	3E2.7.13.11E2.31.1871
R9 X	5852448693	3E5.7.13.23.37.311
1163	5766520288	2E5.59.599.5099
R9 33	5800279712	2E5.101.359.4999
1164	5771384168	2E3.11.103.599.1063
R9 43	6179463832	2E3.37.233.89599
1165	5797165010	2.7E2.5.13.881.1033
R9 43	7302630622	2.7E2.41.293.6203
1166	5797844128	2E5.79.181.12671
R9 33	5825928032	2E5.83.1319.1663
1167	5806329830	2.5.7.29.59.48479
R9 43	6759686170	2.5.47.89.161599
1168	5815260550	2.11.31.5E2.17.20063
R9 X	7082199674	2.11.31.37.43.61.107
1169	5845926555	3E2.5.19.7.37.26399
R9 X	6674009445	3E3.5.19.439.5927
1170	5849277512	2E3.13.179.223.1409
R9 44	6089474488	2E3.41.59.419.751
1171	5857529678	2.7E3.13.11.29E2.71
R9 X	6785209522	2.7.13.239.389.401
1172	5864752630	2.5.11E2.53.109.839
R9 X	6080349770	2.5.11.2393.23099
1173	5871076575	3.5E2.7.13.79.10889
R9 33	6228149025	3.5E2.7.43.263.1049
1174	5885347545	3E3.5.7.11.257.2203
R9 42	7215933735	3E3.5.47.1137263
1175	5906679975	3E5.5E2.7.138899
R9 X	6632100825	3.5E2.7.2777.4549
1176	5907430305	3E3.5.7.151.41399
R9 34	6174745695	3E3.5.17.31.229.379
1177	5907709665	3E2.5.13.11.79.11621
R9 X	6275865375	3E2.5E3.13.429119
1178	5924391392	2E5.43.443.9719
R9 33	6038673568	2E5.263.647.1109
1179	5935418265	3.5.7E2.19.47.9043
R9 X	5941886055	3.5.7.19.37.101.797
1180	5936514512	2E4.17.659.33119
R9 33	6260919088	2E4.263.919.1619
1181	5939023970	2.5.11.29.383.4861
W1 32	6159187870	2.5.11.4159.13463
1182	5945041304	2E3.17.37E3.863
R9 X	6199515496	2E3.23.821.41039
1183	5983596512	2E5.79.227.10427
L1 22	5999426848	2E5.79.631.3761
1184	5990705656	2E3.13.59.71.13751
R9 43	6485108744	2E3.41.647.30559
1185	5992992495	3E3.5.7.71.179.499
R9 44	6448607505	3E3.5.19.47.149.359
1186	6001753725	3E5.5E2.11.19.29.163
R9 X	7322393475	3E2.5E2.79.491.839
1187	6024547696	2E4.29.83.311.503
R9 43	6259666064	2E4.107.293.12479
1188	6031567575	3E2.5E2.11.19.47.2729
R9 43	6642621225	3E2.5E2.17.167.10399
1189	6042829905	3E3.5.7.23.29.9587
R9 43	7211621295	3E3.5.31.1223.1409
1190	6045115850	2.5E2.17.41.89.1949
R9 43	6293938150	2.5E2.29.53.81899
1191	6066248175	3E2.5E2.13.31.149.449
L1 21	6120471825	3E2.5E2.13.31.67499
1192	6067647728	2E4.29.41.313.1019
R9 42	6442489072	2E4.449.896783
1193	6082113015	3E4.5.11.29.179.263
R9 32	6337714185	3E4.5.11.593.2399
1194	6104216464	2E4.59.107.223.271
R9 44	6135000176	2E4.101.127.167.179
1195	6104279475	3E4.5E2.7.499.863
R9 X	6859176525	3E3.5E2.53.109.1759
1196	6107550855	3.5.7E2.19.41.10667
R9 X	6151261305	3.5.7E2.19E2.97.239
1197	6108334785	3E2.5.7.83.167.1399
W1 32	6219908415	3E2.5.7.2239.8819
1198	6135028624	2E4.59.73.127.701
R9 43	6232751216	2E4.47.359.23087
1199	6143533695	3E4.5.13.17.68639
L1 22	6414291585	3E4.5.13.71.17159
1200	6146662545	3E2.5.17.19.53.79.101
R9 44	6226508655	3E2.5.17.29.59.67.71
1201	6155750475	3E2.5E2.7.23.109.1559
R9 X	7121971125	3E2.5E3.59.61.1759
1202	6158708048	2E4.17.811.27919
L1 32	6491732272	2E4.173.2345279
1203	6179700345	3.5.7.13.17.79.3371
R9 43	6872367495	3.5.7.47.59.23603
1204	6181674850	2.5E2.13.59.359.449
R9 43	6473765150	2.5E2.23.139.40499
1205	6200951625	3E3.5E3.11.19.59.149
R9 42	7277448375	3E3.5E3.719.2999
1206	6217030755	3E2.5.13.19.23.83.293
R9 43	6727624605	3E2.5.13.41.179.1567
1207	6249563650	2.5E2.11.449.25307
R9 34	6460113950	2.5E2.29.89.113.443
1208	6255734650	2.5E2.11.1487.7649
R9 34	6447916550	2.5E2.29.61.269.271
1209	6261264590	2.5.7E2.149.191.449
R9 X	7035695410	2.5.37.53.499.719
1210	6262961888	2E5.41.4773599
W1 23	6367983712	2E5.179.1019.1091
1211	6275937424	2E4.19.509.40559
L1 33	6549134576	2E4.179.199.11491
1212	6284451608	2E3.17.113.191.2141
W1 32	6374254312	2E3.17.4787.9791
1213	6287302312	2E3.19.29.881.1619
R9 44	6572257688	2E3.41.89.149.1511
1214	6305672368	2E4.17.751.30869
R9 33	6647873552	2E4.251.839.1973
1215	6307360510	2.5.11.29.461.4289
W1 32	6535869890	2.5.11.1451.40949
1216	6343170730	2.5.17.13.67.42839
R9 33	6870741590	2.5.17.271.293.509
1217	6353438175	3E3.5E2.7.29.199.233
R9 42	7574241825	3E3.5E2.1151.9749
1218	6356368136	2E3.17.23.103.109.181
R9 53	7135510264	2E3.131.2027.3359
1219	6370495978	2.7E2.19.23.11.13523
L1 21	6950103062	2.7E2.19.23.162287
1220	6386741384	2E3.37.23.71.73.181
R3 42	6878699896	2E3.37.701.33151
1221	6397019750	2.5E3.11.19.191.641
R9 X	7447992730	2.5.31.3209.7487
1222	6451021016	2E3.11.41.103.17359
R9 43	7198105384	2E3.97.1151.8059
1223	6460278688	2E5.61.199.16631
R9 33	6532639712	2E5.139.359.4091
1224	6478496595	3E2.5.17.19.23.19379
L1 22	6582073005	3E2.5.17.19.37.12239
1225	6506173275	3.5E2.7.17.599.1217
R9 33	6542991525	3.5E2.7.19.521.1259
1226	6534418330	2.5.11.29.1319.1553
W1 32	6757876070	2.5.11.599.102563
1227	6559115488	2E5.53.281.13763
R9 X	6645570608	2E4.41.971.10433
1228	6562770525	3E3.5E2.31.17.19.971
R9 31	7322055075	3E3.5E2.31.349919
1229	6575884876	2E2.19.41.11E2.107.163
R9 X	7275607604	2E2.19.41.113.20663
1230	6589526450	2.5E2.13.23.29.15199
R9 42	7659561550	2.5E2.11969.12799
1231	6677930385	3E5.7.5.37.21221
R9 X	7412119407	3E5.7E2.11.56591
1232	6682859001	3E2.7.13.17.23.41.509
R9 33	6790149639	3E2.7.13.17.29.67.251
1233	6692989624	2E3.17.101.293.1663
W1 32	6780019016	2E3.17.1087.45863
1234	6716127352	2E3.53.11.971.1483
W1 32	7304467208	2E3.53.211.81647
1235	6718067096	2E3.13.59.79.13859
R9 44	7252812904	2E3.83.131.199.419
1236	6722173575	3E2.5E2.13E2.17.10399
L1 22	7083639225	3E2.5E2.13E2.311.599
1237	6741318350	2.5E2.13.89.116531
L1 X	6913901410	2.5.13.53.1003469
1238	6742313936	2E4.29.47.309167
R9 33	7058945584	2E4.151.431.6779
1239	6752047995	3E2.7.11.5.1151.1693
W1 32	7860694149	3E2.7.11.31.365903
1240	6764433170	2.5.11.23.47.163.349
R9 53	7518523630	2.5.19.383.103319
1241	6768593968	2E4.29.2089.6983
L2 33	6806206832	2E4.37.439.26189
1242	6771898208	2E5.71.151.19739
R9 33	6838279072	2E5.113.563.3359
1243	6777002584	2E3.11.37.233.8933
R9 43	7522400456	2E3.107.227.38713
1244	6788375248	2E4.41.109.139.683
R9 43	6926371952	2E4.47.2309.3989
1245	6789022528	2E6.89.239.4987
W1 32	6894059072	2E6.8599.12527
1246	6794712832	2E8.89.298223
R9 X	6920608928	2E5.227.653.1459
1247	6845195390	2.5.11.53.139.8447
R9 33	6950050690	2.5.11.167.239.1583
1248	6862936275	3E3.5E2.13.29.149.181
R9 X	7354903725	3E2.5E2.13.503.4999
1249	6885178846	2.7E2.19.13.23.83.149
R9 43	7593733154	2.7E2.19.31.293.449
1250	6891050528	2E5.29.2053.3617
R9 X	7154242552	2E3.23E2.971.1741
1251	6898979516	2E2.11.13E2.269.3449
R9 X	7420038484	2E2.17.29.149.25253
1252	6908106488	2E3.19.23.223.8861
L1 42	7384527112	2E3.31.29776319
1253	6921765752	2E3.11.79.995651
L1 33	7415623048	2E3.53.83.210719
1254	6943893957	3E2.7.13.19.11.113.359
R9 X	7397123643	3E2.7E2.13.19.59.1151
1255	6960968212	2E2.19.11.37.139.1619
R9 44	7517943788	2E2.19.53.83.113.199
1256	6999092624	2E4.19.149.191.809
R9 42	7464267376	2E4.20249.23039
1257	7035981610	2.5.7.53.109.127.137
R9 53	8073097430	2.5.29.197.141311
1258	7072796115	3E2.5.7.11.709.2879
R9 44	8238666285	3E2.5.19.79.283.431
1259	7074650624	2E9.947.14591
L1 22	7076729344	2E9.1367.10111
1260	7096666610	2.5.11.53.719.1693
R9 33	7129680910	2.5.11.83.269.2903

1261	7107900496	2E4.23.79.244493
L2 33	7444382384	2E4.191.281.8669
1262	7125887110	2.5.17.19.103.21419
R9 33	7309479290	2.5.17.29.1039.1427
1263	7127201475	3E3.5E2.31.23.59.251
R9 33	7271876925	3E3.5E2.31.53.79.83
1264	7131782710	2.5.17.13.89.101.359
R9 42	7858790090	2.5.17.1223.37799
1265	7143425289	3E3.7.13.11.113.2339
R9 X	7197592311	3E3.7E2.13.17.103.239
1266	7148883170	2.5.11.13.89.56171
R9 X	8138888350	2.5E2.179.251.3623
1267	7194869650	2.5E2.19.43.176129
W1 23	7219609550	2.5E2.19.109.113.617
1268	7268766832	2E4.53.61.83.1693
R9 43	7499850416	2E4.71.461.14321
1269	7274734155	3E2.5.13.19.53E2.233
R9 X	7356799125	3E2.5E3.13.41.12269
1270	7278278085	3E4.5.13.17.233.349
R9 32	7705490715	3E4.5.13.139.10529
1271	7307312410	2.5.19.37.29.73.491
L1 32	7634530790	2.5.19.37.179.6067
1272	7317585748	2E2.19.11.71.113.1091
R9 44	7740482732	2E2.19.37.53.167.311
1273	7319982604	2E2.11E2.17.389.2287
R9 X	7633515956	2E2.11.41.659.6421
1274	7335940912	2E4.17.349.77279
R9 33	7756843088	2E4.419.1049.1103
1275	7336299285	3E2.5.7.19.443.2767
R9 X	8001520875	3E3.5E3.47.73.691
1276	7336566710	2.5.19.11.83.42293
R9 33	8011080010	2.5.19.151.293.953
1277	7347995392	2E8.269.106703
L1 X	7373955488	2E5.71.3245579
1278	7353700965	3E3.5.13.17.103.2393
R9 33	7704367515	3E3.5.13.83.227.233
1279	7390033144	2E3.13.17.491.8513
R9 42	8443963496	2E3.11351.92987
1280	7393819030	2.5.19.13.227.13187
R9 33	7760775530	2.5.19.37.313.3527
1281	7430796945	3E2.5.13.11E2.113.929
R9 X	7967123775	3E2.5E2.13.569.4787
1282	7460005875	3.5E3.7.17.349.479
R9 33	7635802125	3.5E3.7.47.59.1049
1283	7480768832	2E6.233.239.2099
R9 33	7497103168	2E6.269.599.727
1284	7482410325	3E2.5E2.13.31.179.461
R9 X	7531628715	3E2.5.13.31.29.14321
1285	7483202870	2.5.11.13.1499.3491
R9 43	8356509130	2.5.19.3023.14549
1286	7504585408	2E6.79.491.3023
W1 32	7611543872	2E6.1279.92987
1287	7523483030	2.5.7E2.53.271.1069
R9 X	8601297130	2.5.37.71.327419
1288	7534469228	2E2.19.11.13.761.911
R9 X	8810613652	2E2.19E2.227.26879
1289	7562801950	2.5E2.11.2099.6551
L1 X	7792465250	2.5E3.19.1640519
1290	7572722157	3E4.7.11.13.59.1583
R9 33	7883062803	3E4.7.11.23.179.307
1291	7579753125	3.5E5.7.19.6079
R9 X	7619274075	3.5E2.7.19.419.1823
1292	7591540816	2E4.23.3533.5839
R9 33	7763547824	2E4.71.151.45259
1293	7592910975	3E3.5E2.13.43.20123
R9 X	7778605185	3E2.5.13.43.29.10663
1294	7593626504	2E3.17.107.373.1399
W1 32	7674549496	2E3.17.479.117809
1295	7608153350	2.5E2.7.179.121439
R9 33	8655091450	2.5E2.137.383.3299
1296	7631131095	3E4.5.59.7.43.1061
R9 32	8652642345	3E4.5.59.31.11681
1297	7644728944	2E4.67.83.151.569
R9 43	7696789136	2E4.37.607.21419
1298	7689014456	2E3.17.101.389.1439
W1 32	7777449544	2E3.17.599.95471
1299	7693403445	3E2.7.13.47.5.71.563
R9 32	9334667979	3E2.7.13.47.281.863
1300	7696871576	2E3.19.53.127.7523
R9 31	7904894824	2E3.19.52005887
1301	7716789124	2E2.59.11.17.19.9203
R9 43	8982948476	2E2.59.29.103.12743
1302	7720248712	2E3.11.2819.31121
R9 34	8077278488	2E3.37.107.181.1409
1303	7735239556	2E2.11.43.71.89.647
R9 43	7784412284	2E2.11.23.1759.4373
1304	7779344980	2E2.137.5.11.258107
R9 32	10172582636	2E2.137.941.19727
1305	7780806075	3.5E2.7.17.149.5851
R9 X	7893190725	3.5E2.7E2.43.199.251
1306	7787330704	2E4.53.59.317.491
W1 32	7927109936	2E4.53.239.39113
1307	7800706940	2E2.5.13.167.179657
L1 43	9946628932	2E2.53.1511.31051
1308	7807697504	2E5.59.1847.2239
R9 33	7839688096	2E5.109.223.10079
1309	7822669778	2.7E2.11.19.167.2287
R9 X	7952449582	2.7.11.19.131.20747
1310	7877348704	2E5.61.89.45343
L1 32	8062881056	2E5.239.1054247
1311	7900303190	2.5.31.13.619.3167
R9 X	7938683050	2.5E2.31.47.59.1847
1312	7920502317	3E2.7.13.19.17.79.379
R9 33	8013961683	3E2.7.13.19.31.37.449
1313	7923037772	2E2.19.37.13.73.2969
R9 32	8446176628	2E2.19.37.41.73259
1314	7941148664	2E3.97.17.193.3119
R9 33	8074560136	2E3.97.23.389.1163
1315	7941474368	2E6.79.373.4211
L1 32	8063451712	2E6.4679.26927
1316	7961973140	2E2.5.11.67.727.743
R9 52	10600838764	2E2.1637.1618943
1317	7983560655	3E2.5.17.7.29.101.509
R9 42	9545098545	3E2.5.17.2447.5099
1318	8006813199	3E3.7E2.19.11.23.1259
R9 X	8540514801	3E3.7.19.13.113.1619
1319	8038783948	2E2.13.17.19.307.1559
R9 43	8912550452	2E2.13.139.701.1759
1320	8052147896	2E3.13.509.152111
R9 X	8239047304	2E3.23.97E2.4759
1321	8056050244	2E2.11.29.53.139.857
R9 43	8289879356	2E2.11.43.107.40949
1322	8077248916	2E2.11.19.59.83.1973
R9 54	8637003884	2E2.17.23.1879.2939
1323	8119394450	2.5E2.31.19.23.11987
R9 X	9005223790	2.5.31.73.107.3719
1324	8135645416	2E3.19.41.911.1433
W1 32	8342735384	2E3.19.1367.40151
1325	8167602105	3E2.5.13.19.23.43.743
R9 43	8991299655	3E2.5.13.61.197.1279
1326	8188640048	2E4.41.47.349.761
R9 43	8479043152	2E4.97.239.22859
1327	8201184795	3E4.5.17.19.71.883
R9 33	8433856485	3E4.5.17.47.67.389
1328	8226127472	2E4.29.107.223.743
R9 43	8512801168	2E4.71.1889.3967
1329	8237044408	2E3.17.47.1288649
R9 34	8463859592	2E3.43.53.109.4259
1330	8249841116	2E2.11.19.89.110879
R9 33	8515214884	2E2.11.59.71.46199
1331	8260626368	2E6.103.211.5939
L1 32	8371943872	2E6.857.152639
1332	8263107788	2E2.23.47.13.17.8647
L1 32	9310735156	2E2.23.47.83.25943
1333	8269106625	3E2.13E2.31.61.5E3.23
L1 X	9402333759	3E2.13E2.31.61.7.467
1334	8275510971	3E2.7E2.13.19.17.41.109
R9 32	8978525829	3E2.7E2.13.19.139.593
1335	8279312030	2.5.11.37.881.2309
R9 X	8443831330	2.5.11E2.1187.5879
1336	8283367504	2E4.17.1439.21163
R9 33	8722329776	2E4.263.443.4679
1337	8293896650	2.5E2.13.89.307.467
R9 X	8596897270	2.5.13.131.181.2789
1338	8307557128	2E3.269.13.23.12911
R9 32	9263092472	2E3.269.127.33893
1339	8315723650	2.5E2.31.13.139.2969
W1 32	9008167550	2.5E2.31.659.8819
1340	8348580350	2.5E2.11.3163.4799
L1 33	8600334850	2.5E2.17.2239.4519
1341	8367278048	2E5.59.79.56099
L1 32	8597361952	2E5.439.611999
1342	8376676490	2.7.5.13.19E2.43.593
R9 X	11698280566	2.7.967.864107
1343	8452751584	2E5.59.1511.2963
R9 33	8487575456	2E5.79.1481.2267
1344	8455838230	2.7.5.97.911.1367
R9 X	9150518762	2.7.11E2.83.151.431
1345	8459517832	2E3.17E3.31.53.131
R9 X	9400398968	2E3.79.2087.7127
1346	8467262505	3E4.5.13E2.17.19.383
R9 X	9899027415	3E4.5.31.487.1619
1347	8490604005	3E3.5.13.19.89.2861
R9 43	8818771995	3E3.5.11.83.71549
1348	8491739828	2E2.13.11E2.103.13103
R9 X	9271203916	2E2.13.83.227.9463
1349	8502526305	3E2.7E2.13.5.47.6311
R9 X	10355911839	3E2.7.13.53.227.1051
1350	8508118180	2E2.5.17.37.307.2203
R9 53	10993367516	2E2.131.167.125627
1351	8508405465	3E2.5.7.79.181.1889
R3 32	8663076135	3E2.5.7.1871.14699
1352	8517106125	3E3.5E3.11.383.599
R9 33	8735245875	3E3.5E3.29.31.2879
1353	8521860555	3E6.5.13.17.71.149
R9 43	9326392245	3E6.5.23.53.2099
1354	8534619752	2E3.17.23.71.83.463
R9 53	9650022808	2E3.347.503.6911
1355	8557778500	2E2.5E3.197.283.307
R9 X	10355067452	2E2.23.9371.12011
1356	8575844056	2E3.13.71.347.3347
R9 44	9040528424	2E3.53.61.431.811
1357	8628307636	2E2.13.17.79.123551
R9 34	8807350604	2E2.13.31.131.179.233
1358	8645093145	3E5.5.13.23.53.449
R9 32	9186830055	3E5.5.13.599.971
1359	8651076434	2.7.11.13.23.89.2111
R9 43	9742585006	2.7.11.223.239.1187
1360	8658321632	2E5.71.79.48239
R9 33	8847009568	2E5.401.599.1151
1361	8676652328	2E3.19E2.47.97.659
R9 X	9066365272	2E3.43.59.587.761
1362	8717951385	3E2.5.13.11E2.79.1559
R9 X	9407501415	3E2.5.13.37.223.1949
1363	8804881305	3E3.5.11.37.191.839
R9 44	8845601895	3E3.5.13.29.151.1151
1364	8808227056	2E4.59.71.113.1163
R9 43	8962421264	2E4.53.227.46559
1365	8834761364	2E2.11.13.83.379.491
R9 55	9633895276	2E2.23.37.97.163.179
1366	8850661358	2.7E2.19.11.601.719
R9 X	8937716242	2.7.19.13.89.113.257
1367	8851379072	2E7.29.433.5507
R9 X	9435731728	2E4.3467.170099
1368	8894283788	2E2.13.17.113.269.331
R9 54	9131961652	2E2.11.41.107.47309
1369	8902642875	3.5E3.7.17.199499
L1 23	9023629125	3.5E3.7.29.113.1049
1370	8924047490	2.5.17.19.521.5303
R9 X	9017050750	2.5E3.17.271.7829
1371	8935581375	3E2.5E3.7.53.79.271
R9 X	10128267585	3E2.5.19.47.103.2447
1372	8952142815	3E3.5.7.11.53.16249
R9 43	11265457185	3E3.5.179.311.1499
1373	8960679970	2.5.11.41.683.2909
R9 44	9096591710	2.5.17.37.71.20369
1374	8971549180	2E2.5.11.2963.13763
R9 X	11589884804	2E2.151.211E2.431
1375	8975660265	3E2.5.13.11.47.59.503
R6 43	10045057815	3E2.5.13.107.383.419
1376	8990017384	2E3.17.59.1120391
R9 34	9160333016	2E3.37.53.103.5669
1377	8996364572	2E2.17.29.13.89.3943
R9 32	9788118628	2E2.17.29.1019.4871
1378	9006915928	2E3.17.59.317.3541
R9 43	9240051272	2E3.19.1931.31481
1379	9008575485	3.5.7.13.17.23.16879
R9 43	10592750595	3.5.7.127.269.2953
1380	9018517725	3E4.5E2.7.349.1823
R9 X	10138589475	3.5E2.7.19311599

```
 1381  9029724795 3E2.7.13.5.31.83.857
R9 43 11118146949 3E2.7.13.71.263.727
 1382 9054843104 2E5.67.383.11027
L1 32 9086834464 2E5.71.3999487
 1383 9070949152 2E5.53.83.64439
R9 32 9343940768 2E5.971.300719
 1384  9075291470 2.7E2.5.23.43.61.307
R9 X  11614384306 2.7.41.113.241.743
 1385 9083125275 3.5E2.7.19.139.6551
R9 33 9115709925 3.5E2.7.29.47.12739
 1386 9086970310 2.5.53.11.83.89.211
R9 43 9607155770 2.5.53.17.719.1483
 1387 9097736655 3.5.7E2.19.47.83.167
R9 32 9435270705 3.5.7E2.19.587.1151
 1388 9100969376 2E5.79.113.31859
R9 33 9204512224 2E5.179.227.7079
 1389  9136521225 3E3.5E2.13.17.73.839
R9 43 10287235575 3E3.5E2.59.97.2663
 1390  9153086085 3E2.5.13.11.37E2.1039
R9 X  10021735035 3E2.5.13.47.389.937
 1391 9159365024 2E5.53.241.22409
L1 X  9290429416 2E3.17.4157.16433
 1392  9160950225 3.5E2.19.7.17.89.607
R9 44 10380656175 3.5E2.19.37.47.59.71
 1393 9173012056 2E3.13.8689.10151
B4 33 9353372744 2E3.19.281.218987
 1394  9205801010 2.5.7E3.109.24623
R9 X  10296406990 2.5.37.53.191.2749
 1395 9225491168 2E5.83.151.23003
R9 33 9278558368 2E5.113.251.10223
 1396 9251688032 2E5.67.179.24107
R9 33 9338472928 2E5.101.1229.2351
 1397 9257732715 3.5.7.11.347.23099
L1 22 9263662485 3.5.7.11.449.17863
 1398 9262239250 2.5E3.11.1783.1889
R9 X  9673564910 2.5.17.47.181.6689
 1399  9271316500 2E2.5E3.53.271.1291
R9 X  11451453932 2E2.47.101.683.883
 1400 9286443650 2.5E2.11.59.419.683
R9 44 9949825150 2.5E2.53.113.149.223
 1401 9294561770 2.5.13.29.53.181.257
R9 42 9874755670 2.5.13.701.108359
 1402 9303632390 2.5.13.29.113.21839
R9 33 9518953210 2.5.13.59.359.3457
 1403 9307840630 2.11.5.43.313.6287
R9 44 9457161098 2.11.7.17.523.6907
 1404 9344815064 2E3.13.59.659.2311
R9 44 9881776936 2E3.67.79.109.2141
 1405  9357224877 3E2.7E3.13.11E2.41.47
R9 X  10162493523 3E5.7E3.13.83.113
 1406  9374110636 2E2.11.19.53.83.2549
R9 54 10058113364 2E2.13.47.269.15299
 1407  9408690824 2E3.13.41.59.149.251
R9 53 10595069176 2E3.167.1259.6299
 1408 9449054312 2E3.19.71.139.6299
R9 44 9602145688 2E3.29.59.179.3919
 1409 9490622048 2E5.61.4861999
L1 X  9500349952 2E9.4079.4549
 1410  9535950765 3E2.5.11.23.31.41.659
R9 43 10390515795 3E2.5.11.127.197.839
```

```
 1411  9549021568 2E7.37.101.19963
R9 X  10182996752 2E4.9043.70379
 1412 9581473976 2E3.19.59.1068407
W1 23 9649870024 2E3.19.151.593.709
 1413 9616775744 2E6.83.317.5711
W1 32 9760750144 2E6.2351.64871
 1414  9703910930 2.7.17.5.47.173501
L1 32 11882513902 2.7.17.1223.40823
 1415  9723053488 2E4.23.89.307.967
R9 43 10240668752 2E4.263.461.5279
 1416  9766111856 2E4.17.137.262079
L1 32 10415096464 2E4.12959.50231
.1417  9818506568 2E3.13E2.29.179.1399
R9 X  10933693432 2E3.89.1049.14639
 1418 9834780285 3E2.5.11.19.139.7523
L1 22 9884118915 3E2.5.11.19.569.1847
 1419  9836011130 2.5.11.17.79.139.479
R9 54 11065876870 2.5.31.107.149.2239
 1420  9844469775 3E2.5E2.7.23.29.9371
R9 X  11910566385 3E2.5.19.991.14057
 1421  9852159848 2E3.31.23.433.3989
R9 33 10096563352 2E3.31.61.251.2659
 1422  9875558210 2.5.29.7.233.20879
R9 33 11231616190 2.5.29.239.347.467
 1423  9880655085 3E2.5.7.17.233.7919
R9 X  10935385875 3E2.5E3.19.431.1187
 1424  9881488304 2E4.29.47.109.4157
R9 42 10535954896 2E4.5279.124739
 1425  9883587230 2.5.11.47.191.10009
R9 33 10042879330 2.5.11.127.571.1259
 1426 9958985128 2E3.19.103.197.3229
R9 33 9994662872 2E3.19.113.659.883
 1427  9967523980 2E2.257.5.17.37.3083
R9 42 12890541236 2E2.257.107.117191
```

Appendix II

The first 1427 APs ordered according to the various occurring types

```
AMICABLE PAIRS OF TYPE (2,1):

    1 220 2E2.5.11
L1 21 284 2E2.71
    8 17296 2E4.23.47
L1 21 18416 2E4.1151
    9 63020 2E2.23.5.137
L1 21 76084 2E2.23.827
   12 69615 3E2.7.13.5.17
L1 21 87633 3E2.7.13.107
   15 122265 3E2.5.13.11.19
L1 21 139815 3E2.5.13.239
   46 1175265 3E2.7E2.13.5.41
L1 21 1438983 3E2.7E2.13.251
  104 9363584 2E7.191.383
L1 21 9437056 2E7.73727
  117 11498355 3E4.5.11.29.89
L1 21 12024045 3E4.5.11.2699
  162 31536855 3E2.5.7.53.1889
L1 21 32148585 3E2.5.7.102059
  291 175032884 2E2.13.17.389.509
L1 21 175826716 2E2.13.17.198899
  297 183408615 3E2.5.13.19.29.569
L1 21 190055385 3E2.5.13.19.17099
  303 196421715 3E2.5.19.37.7.887
L1 21 224703405 3E2.5.19.37.7103
  460 536637465 3E2.7E2.13.97.5.193
L1 21 646745463 3E2.7E2.13.97.1163
  629 1191953763 3E2.7E2.11.13.41.461
L1 21 1223611389 3E2.7E2.11.13.19403
  640 1225052829 3E4.7.11.29.13.521
L1 21 1321639011 3E4.7.11.29.7307
  792 2172649216 2E8.257.33023
L1 21 2181168896 2E8.8520191
  888 2935281375 3E3.5E3.13.149.449
L1 21 2961518625 3E3.5E3.13.67499
 1030 4149106335 3E4.5.11E3.43.179
L1 21 4268776545 3E4.5.11E3.7919
 1191 6066248175 3E2.5E2.13.31.149.449
L1 21 6120471825 3E2.5E2.13.31.67499
 1219 6370495978 2.7E2.19.23.11.13523
L1 21 6950103062 2.7E2.19.23.162287

TOTAL NUMBER:   20
```

```
AMICABLE PAIRS OF TYPE (3,1):

   86 6955216 2E4.19.137.167
L1 31 7418864 2E4.463679
  151 23358248 2E3.37.23.47.73
L1 31 25233112 2E3.37.85247
  164 32205616 2E4.17.167.709
L1 31 34352624 2E4.2147039
  196 52695376 2E4.17.151.1283
L1 31 56208368 2E4.3513023
  270 147366765 3E2.7E2.13.5.53.97
L1 31 182028483 3E2.7E2.13.31751
  312 205843365 3E2.7E2.13.5.43.167
L1 31 254264283 3E2.7E2.13.44351
  390 347263216 2E4.17.137.9319
L1 31 370414064 2E4.23150879
  446 492275992 2E3.131.13.23.1571
R9 31 553544168 2E3.131.528191
  648 1254255550 2.5E2.23.19.137.419
R9 31 1333078850 2.5E2.23.1159199
  661 1309651310 2.5.11.29.571.719
R9 31 1359071890 2.5.11.12355199
  753 1957374968 2E3.31.17.107.4339
L1 31 2092365832 2E3.31.8436959
  782 2115211995 3E3.5.13.17.31.2287
R9 31 2312891685 3E3.5.13.1317887
  979 3693013664 2E5.41.131.21487
L1 31 3812143072 2E5.119129471
 1009 3986534090 2.5.929.7.11.5573
L1 31 4971106870 2.5.929.535103
 1228 6562770525 3E3.5E2.31.17.19.971
R9 31 7322055075 3E3.5E2.31.349919
 1300 7696871576 2E3.19.53.127.7523
R9 31 7904894824 2E3.19.52005887

TOTAL NUMBER:   16
```

```
AMICABLE PAIRS OF TYPE (4,1):

  779 2099442345 3.5.7.11.13.37.3779
L1 41 2533809495 3.5.7.24131519

TOTAL NUMBER:    1
```

AMICABLE PAIRS OF TYPE (2,2):

```
     3 2620 2E2.5.131
L1 22 2924 2E2.17.43
     4 5020 2E2.5.251
L1 22 5564 2E2.13.107
     6 10744 2E3.17.79
L1 22 10856 2E3.23.59
    10 66928 2E4.47.89
L1 22 66992 2E4.53.79
    11 67095 3E3.5.7.71
L1 22 71145 3E3.5.17.31
    19 171856 2E4.23.467
L1 22 176336 2E4.103.107
    20 176272 2E4.23.479
L1 22 180848 2E4.89.127
    22 196724 2E2.11.17.263
L1 22 202444 2E2.11.43.107
    27 437456 2E4.19.1439
L1 22 455344 2E4.149.191
    29 503056 2E4.23.1367
L1 22 514736 2E4.53.607
    30 522405 3E2.5.13.19.47
L1 22 525915 3E2.5.13.29.31
    44 1154450 2.5E2.11.2099
L1 22 1189150 2.5E2.17.1399
    48 1280565 3E2.5.13.11.199
L1 22 1340235 3E2.5.13.29.79
    50 1358595 3E2.5.19.7.227
L1 22 1486845 3E2.5.19.37.47
    51 1392368 2E4.17.5119
L1 22 1464592 2E4.239.383
    57 2082464 2E5.59.1103
L1 22 2090656 2E5.79.827
    63 2802416 2E4.17.10303
L1 22 2947216 2E4.167.1103
    85 6377175 3E2.5E2.7.4049
L1 22 6680025 3E2.5E2.11.2699
    87 6993610 2.5.13.23.2339
L1 22 7158710 2.5.13.53.1039
    92 7677248 2E6.139.863
L1 22 7684672 2E6.167.719
   100 9071685 3E2.5.31.7.929
L1 22 9498555 3E2.5.31.11.619
   101 9199496 2E3.29.19.2087
L1 22 9592504 2E3.29.173.239
   109 10254970 2.5.11.53.1759
L1 22 10273670 2.5.11.59.1583
   111 10572550 2.5E2.31.19.359
L1 22 10854650 2.5E2.31.47.149
   125 13921528 2E3.19.67.1367
L1 22 13985672 2E3.19.101.911
   130 15002464 2E5.37.12671
L1 22 15334304 2E5.227.2111
   139 17908064 2E5.53.10559
L1 22 18017056 2E5.79.7127
   149 22508145 3E3.5.11.23.659
L1 22 23111055 3E3.5.11.79.197
   197 56055872 2E6.79.11087
L1 22 56598208 2E6.383.2309
```

```
   204 66595130 2.5.31.7.30689
L1 22 74624390 2.5.31.59.4091
   230 90437150 2.5E2.23.19.4139
L1 22 94372450 2.5E2.23.137.599
   233 95629904 2E4.67.37.2411
L1 22 97580944 2E4.67.227.401
   236 97041735 3E2.5.7.71.4339
L1 22 97945785 3E2.5.7.239.1301
   242 109410345 3E4.5.11.41.599
L1 22 110132055 3E4.5.11.59.419
   254 131483835 3E2.5.7.71.5879
L1 22 132692805 3E2.5.7.223.1889
   260 136549413 3E2.7.11.13.23.659
L1 22 140207067 3E2.7.11.13.79.197
   337 256948065 3E3.5.11.23.7523
L1 22 263110815 3E3.5.11.53.3343
   341 265192208 2E4.131.23.5501
L1 22 275148208 2E4.131.251.523
   369 305363984 2E4.43.89.4987
L1 22 306962896 2E4.43.173.2579
   478 595858064 2E4.37.179.5623
L1 22 596654896 2E4.37.239.4217
   495 651016665 3E2.5.13.19.37.1583
L1 22 663576615 3E2.5.13.19.227.263
   503 666030256 2E4.331.19.6619
L1 22 696630544 2E4.331.199.661
   520 749380864 2E8.383.7643
L1 22 750555392 2E8.1567.1871
   528 766292835 3.5.7.11.503.1319
L1 22 766512285 3.5.7.11.769.863
   530 770805945 3E2.7.13.41.5.4591
L1 22 914053959 3E2.7.13.41.163.167
   556 902335744 2E8.383.9203
L1 22 903709952 2E8.1151.3067
   641 1237888448 2E6.73.264959
L1 22 1252205632 2E6.479.40847
   689 1525222575 3E3.5E2.17.23.5779
L1 22 1571007825 3E3.5E2.17.79.1733
   695 1558818261 3E2.7.11.13.23.7523
L1 22 1596205611 3E2.7.11.13.53.3343
   708 1666611045 3E4.5.11E2.71.479
L1 22 1670433435 3E4.5.11E2.89.383
   718 1750776704 2E7.137.99839
L1 22 1762592896 2E7.2879.4783
   729 1786492785 3.5.7.11.293.5279
L1 22 1790052495 3.5.7.11.1231.1259
   755 1974754485 3E4.5.11E2.59.683
L1 22 1987985835 3E4.5.11E2.113.359
   787 2152573605 3E2.7.13.37.5.14207
L1 22 2564027739 3E2.7.13.37.191.443
   994 3865930695 3E2.5.11.29.43.6263
L1 22 3873366585 3E2.5.11.29.47.5741
  1031 4150593232 2E4.43.61.98899
L1 22 4213181968 2E4.43.859.7129
  1052 4377991936 2E8.293.58367
L1 22 4390866176 2E8.3583.4787
  1057 4429428675 3.5E2.7.19.167.2659
L1 22 4436670525 3.5E2.7.19.239.1861
  1081 4796703664 2E4.43.67.104059
L1 22 4855069456 2E4.43.373.18919
```

```
  1090 4893008692 2E2.11.109.13.78479
L1 22 5259164108 2E2.11.109.839.1307
  1183 5983596512 2E5.79.227.10427
L1 22 5999426848 2E5.79.631.3761
  1199 6143533695 3E4.5.13.17.68639
L1 22 6414291585 3E4.5.13.71.17159
  1224 6478496595 3E2.5.17.19.23.19379
L1 22 6582073005 3E2.5.17.19.37.12239
  1236 6722173575 3E2.5E2.13E2.17.10399
L1 22 7083639225 3E2.5E2.13E2.311.599
  1259 7074650624 2E9.947.14591
L1 22 7076729344 2E9.1367.10111
  1397 9257732715 3.5.7.11.347.23099
L1 22 9263662485 3.5.7.11.449.17863
  1418 9834780285 3E2.5.11.19.139.7523
L1 22 9884118915 3E2.5.11.19.569.1847
```

TOTAL NUMBER: 67

AMICABLE PAIRS OF TYPE (3,2):

```
    14 100485 3E2.5.7.11.29
L1 32 124155 3E2.5.31.89
    18 142310 2.5.7.19.107
L1 32 168730 2.5.47.359
    21 185368 2E3.17.29.47
L1 32 203432 2E3.59.431
    24 308620 2E2.5.13.1187
L1 32 389924 2E2.43.2267
    26 356408 2E3.13.23.149
L1 32 399592 2E3.199.251
    31 600392 2E3.13.23.251
L1 32 669688 2E3.97.863
    32 609928 2E3.11.29.239
L1 32 686072 2E3.191.449
    33 624184 2E3.11.41.173
L1 32 691256 2E3.71.1217
    34 635624 2E3.11.31.233
L1 32 712216 2E3.127.701
    35 643336 2E3.29.47.59
L1 32 652664 2E3.17.4799
    37 726104 2E3.17.19.281
L1 32 796696 2E3.53.1879
    40 898216 2E3.11.59.173
L1 32 980984 2E3.47.2609
    41  947835 3E3.5.7.17.59
L1 32 1125765 3E3.5.31.269
    42  998104 2E3.17.41.179
L1 32 1043096 2E3.23.5669
    45 1156870 2.5.11.13.809
L1 32 1292570 2.5.19.6803
    59 2652728 2E3.13.23.1109
L1 32 2941672 2E3.71.5179
    60 2723792 2E4.37.43.107
L1 32 2874064 2E4.263.683
    62 2739704 2E3.11.163.191
L1 32 2928136 2E3.31.11807
    65 3276856 2E3.11.23.1619
L1 32 3721544 2E3.647.719
    67 3786904 2E3.11.23.1871
L1 32 4300136 2E3.467.1151
    68 3805264 2E4.29.59.139
L1 32 4006736 2E4.179.1399
    76 5147032 2E3.11.23.2543
L1 32 5843048 2E3.383.1907
    81 5726072 2E3.11.31.2099
L1 32 6369928 2E3.79.10079
    91 7577350 2.5E2.11.23.599
L1 32 8493050 2.5E2.59.2879
    98  8754130 2.5.7.11.11369
L1 32 10893230 2.5.757.1439
   114 10992735 3E2.5.13.19.23.43
L1 32 12070305 3E2.5.13.47.439
   118 11545616 2E4.19.163.233
L1 32 12247504 2E4.491.1559
   121 12397552 2E4.23.59.571
L1 32 13136528 2E4.359.2287
   129 14654150 2.5E2.7.149.281
L1 32 16817050 2.5E2.179.1879
```

```
 134 16871582 2.7E2.19.13.17.41
L1 32 19325698 2.7E2.19.97.107
 137 17754165 3E2.5.13.11.31.89
L1 32 19985355 3E2.5.13.127.269
 138 17844255 3E2.5.13.11.47.59
L1 32 19895265 3E2.5.13.71.479
 147 22227075 3E3.5E2.13.17.149
L1 32 24644925 3E3.5E2.29.1259
 156 25966832 2E4.29.191.293
L1 32 26529808 2E4.47.35279
 160 30724694 2.7.13.11.103.149
L1 32 32174506 2.7.13.17.10399
 168 34256222 2.7.11.13.71.241
L1 32 35997346 2.7.11.23.10163
 172 35361326 2.7.13.11.17.1039
L1 32 40117714 2.7.13.53.4159
 173 35373195 3E2.5.13.11.23.239
L1 32 40105845 3E2.5.13.179.383
 175 35472592 2E4.43.47.1097
L1 32 36415664 2E4.53.42943
 176 37363095 3E2.7.11.5.41.263
L1 32 45663849 3E2.7.11.131.503
 178 37848915 3E2.5.13.23.29.97
L1 32 39202605 3E2.5.13.19.3527
 181 38663950 2.5E2.13.17.3499
L1 32 43362050 2.5E2.59.14699
 200 58580540 2E2.23.5.347.367
L1 32 70507972 2E2.23.521.1471
 203 63717615 3E2.5.13.17.43.149
L1 32 66011985 3E2.5.13.19.5939
 213 74055952 2E4.23.61.3299
L1 32 78166448 2E4.197.24799
 216 75171808 2E5.53.127.349
L1 32 77237792 2E5.479.5039
 222  82633005 3E2.7.13.5.17.1187
L1 32 104177619 3E2.7.13.131.971
 229 89477984 2E5.59.83.571
L1 32 92143456 2E5.1637.1759
 232 93837808 2E4.19.83.3719
L1 32 99899792 2E4.1399.4463
 234  95791430 2.7.17.5.101.797
L1 32 115187002 2.7.17.113.4283
 237 102023145 3E4.7E2.5.53.97
L1 32 116970399 3E4.7E2.13.2267
 241 108734050 2.5E2.31.29.41.59
L1 32 116251550 2.5E2.31.179.419
 243 110960710 2.5.67.7.59.401
L1 32 125222330 2.5.67.31.6029
 257 133768816 2E4.19.131.3359
L1 32 141213584 2E4.199.44351
 268 145040288 2E5.41.227.487
L1 32 149364256 2E5.1063.4391
 271 148077644 2E2.13.11.83.3119
L1 32 160128436 2E2.13.47.65519
 276 156226856 2E3.31.23.61.449
L1 32 165181144 2E3.31.199.3347
 284 168930032 2E4.23.47.9767
L1 32 179904784 2E4.1583.7103
 287 169652512 2E5.71.89.839
L1 32 173269088 2E5.191.28349

 290 172271385 3E2.5.13.11.19.1409
L1 32 197261415 3E2.5.13.449.751
 292 176632390 2.5.11.43.107.349
W1 32 182618810 2.5.11.719.2309
 320 223878416 2E4.37.79.4787
L1 32 227342704 2E4.41.346559
 321 224888895 3E2.7.11.5.41.1583
L1 32 273272769 3E2.7.11.83.4751
 324 231111392 2E5.109.173.383
W1 32 231923488 2E5.71.102079
 325 238162815 3E3.5.23.11.19.367
L1 32 270560385 3E3.5.23.79.1103
 327 242126704 2E4.23.47.13999
L1 32 257841296 2E4.1399.11519
 334 252940545 3E2.5.13.11.23.1709
W1 32 284847615 3E2.5.13.89.5471
 335 253703776 2E5.59.83.1619
L1 32 260678624 2E5.449.18143
 336 256755056 2E4.19.79.10691
L1 32 273568144 2E4.2591.6599
 340 264764630 2.5.17.13.47.2549
L1 32 290441770 2.5.17.359.4759
 344 270208672 2E5.59.167.857
L1 32 274655648 2E5.131.65519
 346 271629728 2E5.37.383.599
L1 32 279947872 2E5.1709.5119
 349 274893410 2.5.11.43.89.653
W1 32 284512030 2.5.11.1187.2179
 350 275304590 2.5.11.61.89.461
W1 32 281534770 2.5.11.139.18413
 352 276339808 2E5.97.127.701
L1 32 278431136 2E5.83.104831
 359 291679245 3E3.5.29.11.13.521
R9 32 339731955 3E3.5.29.107.811
 360 291974824 2E3.19.89.113.191
R9 32 299001176 2E3.19.1367.1439
 370 305911606 2.7E2.11.13.83.263
R9 32 331160522 2.7E2.11.97.3167
 371 308939936 2E5.37.311.839
W1 32 318479584 2E5.2393.4159
 373 311913855 3E3.5.11.41.47.109
W1 32 326754945 3E3.5.11.139.1583
 380 320829728 2E5.59.109.1559
L1 32 327818272 2E5.199.51479
 383 330811850 2.5E2.31.19.47.239
W1 32 354858550 2.5E2.31.179.1279
 392 348782488 2E3.31.23.47.1301
W1 32 371171432 2E3.31.557.2687
 393 356775430 2.5.17.11.101.1889
L1 32 392753210 2.5.17.1427.1619
 397 360172336 2E4.17.149.8887
L1 32 383753264 2E4.2221.10799
 398 360759652 2E2.11.17.29.16631
L1 32 393667868 2E2.11.263.34019
 406 377141350 2.5E2.31.23.71.149
W1 32 394237850 2.5E2.31.53.4799
 408 385465395 3.5.7.23.17.41.229
L1 32 415773645 3.5.7.23.107.1609
 410 391548675 3.5E2.7.17.19.2309
L1 32 433398525 3.5E2.7.139.5939

 411 393463072 2E5.43.269.1063
L1 32 402877088 2E5.251.50159
 419 406640992 2E5.47.167.1619
L1 32 416370848 2E5.251.51839
 421 414195782 2.7.11.13.19.10889
L1 32 463973818 2.7.11.83.36299
 424 426191535 3E2.7.11.5.47.2617
W1 32 514780497 3E2.7.11.67.11087
 427 427950350 2.5E2.31.17.109.149
L1 32 455921650 2.5E2.31.107.2749
 430 436386015 3E3.5.19.13.23.569
R9 32 482909985 3E3.5.19.59.3191
 431 437888168 2E3.23.29.137.599
W1 32 456351832 2E3.23.827.2999
 436 447761144 2E3.19.113.131.199
R9 32 455118856 2E3.19.197.15199
 439 466389344 2E5.71.131.1567
L1 32 472453792 2E5.107.137983
 443 475838415 3E3.5.13.17.41.389
W1 32 514823985 3E3.5.13.233.1259
 444 487169380 2E2.37.5.41.16057
W1 32 589230476 2E2.37.61.65267
 456 525254368 2E5.37.271.1637
L1 32 541358816 2E5.1481.11423
 461 537882550 2.5E2.31.17.137.149
W1 32 570975050 2.5E2.31.89.4139
 464 545134144 2E6.157.227.239
R9 32 552877376 2E6.1579.5471
 466 553978490 2.5.13.17.439.571
W1 32 587641990 2.5.13.479.9437
 468 558173344 2E5.41.467.911
L1 32 571181792 2E5.233.76607
 483 602035390 2.5.11.41.131.1019
W1 32 619418690 2.5.11.239.23561
 486 621354896 2E4.17.167.13679
L1 32 661063024 2E4.809.51071
 492 640866135 3.5.7.23.13.137.149
L1 32 694532265 3.5.7.23.139.2069
 494 647314690 2.5.11.43.107.1279
W1 32 666518270 2.5.11.263.23039
 499 659854052 2E2.13.11.29.39779
W1 32 743584348 2E2.13.701.20399
 500 660792650 2.5E2.7.149.12671
L1 32 753402550 2.5E2.109.138239
 504 672672884 2E2.13.19.97.7019
L1 32 675728716 2E2.13.17.764399
 511 691075330 2.5.17.11.101.3659
L1 32 760392830 2.5.17.719.6221
 514 701168432 2E4.23.107.17807
L1 32 729739984 2E4.83.549503
 515 704374540 2E2.23.5.137.11177
L1 32 850529972 2E2.23.971.9521
 521 750893325 3.5E2.7.13.269.409
L1 32 786508275 3.5E2.7.29.51659
 524 754484445 3E2.5.13E2.11.29.311
R9 32 848771235 3E2.5.13E2.233.479
 526 761511104 2E6.223.229.233
R9 32 769560256 2E6.389.30911
 531 776813895 3E5.11.13.5.17.263
L1 32 966751929 3E5.11.13.43.647

 532 786882915 3E2.7E2.13.5.97.283
L1 32 945492093 3E2.7E2.13.83.1987
 540 836535328 2E5.47.101.5507
W1 32 862396256 2E5.1733.15551
 542 846862965 3E3.5.13.19.109.233
W1 32 882865035 3E3.5.13.43.11699
 551 874591550 2.5E2.7.1499.1667
L1 32 986896450 2.5E2.71.277999
 557 903825416 2E3.47.13.179.1033
W1 32 972264184 2E3.47.131.19739
 559 907960904 2E3.19.79.83.911
R9 32 930631096 2E3.19.1279.4787
 561 914746450 2.5E2.31.19.89.349
W1 32 960133550 2.5E2.31.59.10499
 563 917168950 2.5E2.19.37.97.269
W1 32 953023850 2.5E2.19.587.1709
 564  925949992 2E3.83.11.331.383
L1 32 1001668568 2E3.83.71.21247
 575  965674256 2E4.17.599.5927
L1 32 1019020144 2E4.191.333449
 592 1018330430 2.5.13.17.197.2339
L1 32 1083289090 2.5.13.1619.5147
 594 1024706624 2E6.103.359.433
R9 32 1038911296 2E6.1091.14879
 597 1040792450 2.5E2.31.19.59.599
L1 32 1101927550 2.5E2.31.79.8999
 600 1047827656 2E3.19.71.151.643
W1 32 1066553144 2E3.19.227.30911
 605 1069306732 2E2.13.41.17.163.181
R9 32 1142071892 2E2.13.41.491.1091
 611 1090509248 2E6.109.223.701
L1 32 1106245312 2E6.1637.10559
 612 1091947540 2E2.23.5.137.17327
L1 32 1318446572 2E2.23.911.15731
 619 1123132540 2E2.53.5.17.62327
L1 32 1421345732 2E2.53.251.26711
 635 1212636350 2.5E2.17.67.107.199
W1 32 1246134850 2.5E2.17.719.2039
 636 1216541326 2.7E2.11.13.47.1847
R9 32 1331747186 2.7E2.11.197.6271
 638 1223289664 2E6.251.271.281
R9 32 1231545152 2E6.223.86291
 643 1239657136 2E4.17.727.6269
L1 32 1307367344 2E4.181.451439
 655 1277879584 2E5.59.71.9533
L1 32 1316893856 2E5.1259.32687
 671 1363688048 2E4.17.191.26249
L1 32 1448631952 2E4.503.179999
 673 1375090832 2E4.17.379.13339
L1 32 1453522768 2E4.227.400199
 677 1420875830 2.5.79.11.23.7109
L1 32 1527783370 2.5.79.17.113759
 678 1444854411 3E2.7.13.23.11.19.367
L1 32 1641399669 3E2.7.13.23.79.1103
 681 1456694650 2.5E2.31.23.29.1409
W1 32 1564540550 2.5E2.31.179.5639
 684 1486565325 3E3.5E2.7.23.13679
R9 32 1770369075 3E3.5E2.911.2879
 694 1550703136 2E5.59.317.2591
L1 32 1564984544 2E5.89.549503
```

```
700 1577617335 3E2.5.7.137.139.263
W1 32 1605082185 3E2.5.7.1439.3541
704 1607089672 2E3.23.37.59.4001
R9 32 1677751928 2E3.23.2203.4139
710 1667890144 2E5.37.223.6317
R9 32 1720175264 2E5.2591.20747
717 1741985325 3E3.5E2.31.17.59.83
R9 32 1857784275 3E3.5E2.31.47.1889
731 1796310350 2.5E2.23.19.229.359
R9 32 1899881650 2.5E2.23.479.3449
740 1874188690 2.5.19.11.59.15199
L1 32 2065651310 2.5.19.151.71999
741 1879626735 3E3.5.107.7.29.641
R9 32 2114126865 3E3.5.107.19.7703
743 1892277387 3E2.7.11.13.41.47.109
R9 32 1982313333 3E2.7.11.13.139.1583
747 1915705352 2E3.53.11.431.953
W1 32 2090178808 2E3.53.317.15551
757 1981631584 2E5.59.71.14783
L1 32 2041981856 2E5.1187.53759
760 1990992825 3E3.5E2.31.17.29.193
L1 32 2165883975 3E3.5E2.31.89.1163
761 1991349664 2E5.41.251.6047
L1 32 2041408352 2E5.293.217727
768 2040024987 3E3.7E2.11.13.41.263
L1 32 2207122533 3E3.7E2.11.43.3527
781 2110489384 2E3.23.29.137.2887
L1 32 2193785816 2E3.23.359.33211
783 2125619990 2.5.17.13.41.23459
L1 32 2343791530 2.5.17.3331.4139
784 2128669790 2.5.13.17.179.5381
L1 32 2265625570 2.5.13.2339.7451
785 2140484535 3E4.7.23.5.17.1931
R9 32 2707011657 3E4.7.23.251.827
791 2158771095 3E4.5.17.13.89.271
R9 32 2319893865 3E4.5.17.59.5711
793 2198463784 2E3.379.11.29.2273
R9 32 2467784216 2E3.379.179.4547
796 2221700481 3E4.7.11E2.13.47.53
R9 32 2450161791 3E4.7.11E2.71.503
797 2221834450 2.5E2.11.1049.3851
L1 32 2291939150 2.5E2.17.2696399
801 2246508224 2E6.227.239.647
R9 32 2256728896 2E6.179.196991
803 2265070275 3E2.5E2.13.19.53.769
R9 32 2426816925 3E2.5E2.13.659.1259
805 2278422088 2E3.19.53.151.1873
R9 32 2336115512 2E3.19.1367.11243
810 2300473575 3E3.5E2.31.17.29.223
L1 32 2499219225 3E3.5E2.31.83.1439
812 2317392152 2E3.19.47.227.1429
R9 32 2377583848 2E3.19.3761.4159
813 2331923265 3E2.5.7.89.223.373
W1 32 2372936895 3E2.5.7.1427.5279
815 2359263375 3E3.5E3.7.37.2699
R9 32 2762528625 3E3.5E3.449.1823
817 2378640285 3E2.5.7.103.167.439
W1 32 2418472035 3E2.5.7.839.9151
830 2441219715 3E4.5.11.47.89.131
R3 32 2526711165 3E4.5.11.197.2879
831 2446241032 2E3.19.61.193.1367
W1 32 2490050168 2E3.19.227.72167
833 2450252385 3E2.5.7.107.139.523
W1 32 2493624735 3E2.5.7.1571.5039
839 2509841530 2.5.31.7.311.3719
W1 32 2838387590 2.5.31.71.128959
840 2511601365 3.5.7.13.53.149.233
W1 32 2583233835 3.5.7.13.971.1949
860 2724296672 2E5.53.79.20333
L2 32 2809804768 2E5.2591.33889
861 2724801970 2.5.19.11.47.27739
L1 32 3027364430 2.5.19.359.44383
875 2842515016 2E3.127.11.167.1523
R9 32 3056462264 2E3.127.47.64007
879 2873321512 2E3.19.113.131.1277
W1 32 2896081688 2E3.19.107.178067
880 2874527150 2.5E2.11.137.38149
L1 32 3000878050 2.5E2.19.3158819
886 2931524416 2E6.79.569.1019
W1 32 2975499584 2E6.2719.17099
890 2952121352 2E3.61.19.29.10979
W1 32 3174718648 2E3.61.79.82349
891 2953084864 2E6.101.461.991
L1 32 2983785152 2E6.373.124991
895 2982855752 2E3.19.47.239.1747
R9 32 3058232248 2E3.19.1279.15731
896 2995106895 3E3.5.19E2.11.37.151
L1 32 3342782385 3E3.5.19E2.113.607
899 3000210675 3.5E2.19.37.7.11.739
R9 32 3694598925 3.5E2.19.37.79.887
902 3009763264 2E6.83.443.1279
W1 32 3053074496 2E6.1439.33151
907 3037569344 2E6.101.311.1511
L1 32 3073402432 2E6.503.95471
910 3071356244 2E2.23.229.11.29.457
R9 32 3299606956 2E2.23.229.19.8243
928 3279018015 3E2.7E2.13.5.73.1567
L1 32 3943277793 3E2.7E2.13.83.8287
929 3293577950 2.5E2.31.13.149.1097
L1 32 3568482850 2.5E2.31.853.2699
933 3341224575 3E2.5E2.13.19.59.1019
L1 32 3564583425 3E2.5E2.13.239.5099
944 3411757220 2E2.173.5.691.1427
W1 32 3809832988 2E2.173.13.423503
954 3443961465 3E2.5.23.7.53.8969
R9 32 3810113415 3E2.5.23.19.193751
956 3452049632 2E5.43.263.9539
L1 32 3529398688 2E5.211.522719
960 3481924064 2E5.71.103.14879
L1 32 3537626656 2E5.127.870479
961 3502908585 3E4.5.11.37.79.269
R9 32 3647901015 3E4.5.11.599.1367
965 3564199504 2E4.47.101.167.281
R9 32 3626340272 2E4.47.503.9587
977 3680156392 2E3.101.11.41.10099
W1 32 4108155608 2E3.101.1009.5039
995 3868964990 2.5.11.43.509.1607
W1 32 3925075330 2.5.11.89.400927
996 3877164568 2E3.17.101.277.1019
W1 32 3932077832 2E3.17.5003.5779
1002 3940697128 2E3.19.53.163.3001
R9 32 4035016472 2E3.19.683.38867
1015 4032465344 2E6.107.191.3083
W1 32 4089162304 2E6.1151.55511
1033 4161910012 2E2.53.211.13.17.421
L1 32 4360072772 2E2.53.211.11.8861
1039 4261080915 3E2.7E2.13.5.43.3457
R3 32 5209468173 3E2.7E2.13.227.4003
1048 4346372745 3E2.11.13.17.5.67.593
R9 32 5180969079 3E2.11.13.17.43.5507
1049 4355468325 3E2.5E2.13.19.109.719
R9 32 4581459675 3E2.5E2.13.89.17599
1050 4373598075 3.5E2.11.7.17.44549
W3 32 5172219525 3.5E2.11.43.145799
1056 4416880923 3E2.7E2.13.19.23.41.43
R2 32 4785272037 3E2.7E2.13.19.197.223
1058 4458625504 2E5.37.269.13999
L1 32 4590694496 2E5.797.179999
1065 4582247428 2E2.11.29.79.131.347
R9 32 4678450172 2E2.11.29.463.7919
1076 4754422208 2E6.157.269.1759
R9 32 4780940992 2E6.197.379199
1087 4863771495 3E3.5.11.43.59.1291
R9 32 4959562905 3E3.5.11.47.71059
1088 4875810975 3E2.5E2.31.7.37.2699
R9 32 5709225825 3E2.5E2.31.449.1823
1091 4900571656 2E3.19.71.83.5471
R9 32 5027825144 2E3.19.2267.14591
1116 5191917776 2E4.17.167.114299
L1 32 5523021424 2E4.761.453599
1121 5257013762 2.7.11.43.13.79.773
R9 32 5728089598 2.7.11.43.839.1031
1134 5444062533 3E2.7E2.13.19.23.41.53
R9 32 5849488827 3E2.7E2.13.19.83.647
1137 5454702435 3.5.7.13.43.199.467
W1 32 5615556765 3.5.7.13.1319.3119
1140 5497064685 3E2.5.7.83.167.1259
R9 32 5598354195 3E2.5.7.3527.5039
1142 5502767650 2.5E2.19.37.89.1759
W1 32 5692944350 2.5E2.19.227.26399
1145 5552366085 3E2.5.7.79.347.643
W1 32 5635304955 3E2.5.7.463.38639
1149 5579526590 2.5.11E2.89.197.263
R9 32 5682998530 2.5.11E2.659.7127
1158 5697735225 3.5E2.7.13.167.4999
L1 32 5968184775 3.5E2.7.29.391999
1181 5939023970 2.5.11.29.383.4861
W1 32 6159187870 2.5.11.4159.13463
1193 6082113015 3E4.5.11.29.179.263
R9 32 6337714185 3E4.5.11.593.2399
1197 6108334785 3E2.5.7.83.167.1399
W1 32 6219908415 3E2.5.7.2239.8819
1202 6158708048 2E4.17.811.27919
L1 32 6491732272 2E4.173.2345279
1212 6284451608 2E3.17.113.191.2141
W1 32 6374254312 2E3.17.4787.9791
1215 6307360510 2.5.11.29.461.4289
W1 32 6535869890 2.5.11.1451.40949
1226 6534418330 2.5.11.29.1319.1553
W1 32 6757876070 2.5.11.599.102563
1233 6692989624 2E3.17.101.293.1663
W1 32 6780019016 2E3.17.1087.45863
1234 6716127352 2E3.53.11.971.1483
W1 32 7304467208 2E3.53.211.81647
1239 6752047995 3E2.7.11.5.1151.1693
W1 32 7860694149 3E2.7.11.31.365903
1245 6789022528 2E6.89.239.4987
W1 32 6894059072 2E6.8599.12527
1270 7278278085 3E4.5.13.17.233.349
R9 32 7705490715 3E4.5.13.139.10529
1271 7307312410 2.5.19.37.29.73.491
L1 32 7634530790 2.5.19.37.179.6067
1286 7504585408 2E6.79.491.3023
W1 32 7611543872 2E6.1279.92987
1294 7593626504 2E3.17.107.373.1399
W1 32 7674549496 2E3.17.479.117809
1296 7631131095 3E4.5.59.7.43.1061
R9 32 8652642345 3E4.5.59.31.11681
1298 7689014456 2E3.17.101.389.1439
W1 32 7777449544 2E3.17.599.95471
1299 7693403445 3E2.7.13.47.5.71.563
R9 32 9334667979 3E2.7.13.47.281.863
1304 7779344980 2E2.137.5.11.258107
R9 32 10172582636 2E2.137.941.19727
1306 7787330704 2E4.53.59.317.491
W1 32 7927109936 2E4.53.239.39113
1310 7877348704 2E5.61.89.45343
L1 32 8062881056 2E5.239.1054247
1313 7923037772 2E2.19.37.13.73.2969
R9 32 8446176628 2E2.19.37.41.73259
1315 7941474368 2E6.79.373.4211
L1 32 8063451712 2E6.4679.26927
1324 8135645416 2E3.19.41.911.1433
W1 32 8342735384 2E3.19.1367.40151
1331 8260626368 2E6.103.211.5939
L1 32 8371943872 2E6.857.152639
1332 8263107788 2E2.23.47.13.17.8647
L1 32 9310735156 2E2.23.47.83.25943
1334 8275510971 3E2.7E2.13.19.17.41.109
R9 32 8978525829 3E2.7E2.13.19.139.593
1338 8307557128 2E3.269.13.23.12911
R9 32 9263092472 2E3.269.127.33893
1339 8315723650 2.5E2.31.13.139.2969
W1 32 9008167550 2.5E2.31.659.8819
1341 8367278048 2E5.59.79.56099
L1 32 8597361952 2E5.439.611999
1351 8508405465 3E2.5.7.79.181.1889
R3 32 8663076135 3E2.5.7.1871.14699
1358 8645093145 3E5.5.13.23.53.449
R9 32 9186830055 3E5.5.13.599.971
1377 8996364572 2E2.17.29.13.89.3943
R9 32 9788118628 2E2.17.29.1019.4871
1382 9054843104 2E5.67.383.11027
L1 32 9086834464 2E5.71.3999487
1383 9070949152 2E5.53.83.64439
R9 32 9343940768 2E5.971.300719
1387 9097736655 3.5.7E2.19.47.83.167
R9 32 9435270705 3.5.7E2.19.587.1151
1413 9616775744 2E6.83.317.5711
W1 32 9760750144 2E6.2351.64871
1414 9703910930 2.7.17.5.47.173501
L1 32 11882513902 2.7.17.1223.40823
1416 9766111856 2E4.17.137.262079
L1 32 10415096464 2E4.12959.50231

TOTAL NUMBER: 271
```

AMICABLE PAIRS OF TYPE (4,2):

```
   55 1669910 2.5.11.17.19.47
L1 42 2062570 2.5.239.863
   64 2803580 2E2.5.13.41.263
L1 42 3716164 2E2.503.1847
   73 4532710 2.7.5.13.17.293
L1 42 6135962 2.7.71.6173
   83 5864660 2E2.5.17.47.367
L1 42 7489324 2E2.53.35327
  122 12707704 2E3.17.41.43.53
L1 42 14236136 2E3.107.16631
  144 20022328 2E3.17.23.37.173
L1 42 22823432 2E3.1367.2087
  150 22608632 2E3.19.23.29.223
L1 42 25775368 2E3.1439.2239
  171 35115795 3E3.5.11.13.17.107
L1 42 43266285 3E3.5.53.6047
  174 35390008 2E3.19.23.53.191
L1 42 39259592 2E3.71.69119
  207 67738268 2E2.19.13.17.37.109
L1 42 79732132 2E2.19.263.3989
  208 68891992 2E3.13.23.83.347
L1 42 78437288 2E3.587.16703
  218 78088504 2E3.13.31.53.457
L1 42 88110536 2E3.167.65951
  224  84521745 3E3.5.7.11.47.173
L1 42 107908335 3E3.5.383.2087
  298 186753688 2E3.11.41.191.271
L1 42 208059752 2E3.83.313343
  301 190888155 3E2.5.17.19.23.571
R9 42 194594085 3E2.5.7.617759
  310 204134385 3.5.7.13.17.19.463
L1 42 244869135 3.5.7.383.6089
  317 214748488 2E3.17.19.41.2027
L1 42 245201912 2E3.3041.10079
  362 300120652 2E2.17.13.23.29.509
L1 42 347620148 2E2.17.179.28559
  394 357197302 2.7.11.17.19.43.167
R9 42 409205258 2.7.11.863.3079
  400 362700728 2E3.13.19.173.1061
R9 42 413408872 2E3.811.63719
  404 373305350 2.5E2.11.19.139.257
R9 42 432893050 2.5E2.859.10079
  438 465605192 2E3.13.23.61.3191
R9 42 531830968 2E3.6271.10601
  447 494495768 2E3.13.23.61.3389
R9 42 564811432 2E3.5039.14011
  453 519257296 2E4.29.83.97.139
R9 42 552549104 2E4.881.39199
  498 659084504 2E3.13.23.61.4517
L1 42 752700136 2E3.3347.28111
  507 681709490 2.5.7.11.929.953
L1 42 851406670 2.5.2879.29573
  519 728921270 2.5.7.11.929.1019
L1 42 910259530 2.5.2447.37199
  552 877324936 2E3.29.47.61.1319
R3 42 890419064 2E3.17.6547199
  569  949308932 2E2.19.11.13.113.773
R9 42 1126001788 2E2.19.3191.4643
  574  965615992 2E3.11.23.349.1367
R9 42 1102800008 2E3.3359.41039
  591 1016475064 2E3.11.23.349.1439
R9 42 1160804936 2E3.2999.48383
  599 1047784504 2E3.13.23.101.4337
R9 42 1182294536 2E3.167.884951
  614 1100526075 3E3.5E2.11.19.29.269
R9 42 1310033925 3E3.5E2.809.2399
  667 1335474855 3E2.5.13.11.37.71.79
R9 42 1532728665 3E2.5.13.431.6079
  688 1518524175 3.5E2.7.19.41.47.79
R9 42 1681271025 3.5E2.7.139.23039
  711 1689026570 2.7E2.5.11.41.7643
R9 42 2263716406 2.7E2.1567.14741
  713 1699746184 2E3.23.41.233.967
R3 42 1725115256 2E3.17.12684671
  727 1785186728 2E3.13.17.787.1283
R9 42 2039387032 2E3.6047.42157
  732 1812992710 2.5.17.23.29.59.271
R9 42 1994136890 2.5.17.599.19583
  737 1860630824 2E3.13.17.691.1523
R9 42 2125787416 2E3.9341.28447
  739 1862890150 2.5E2.11.19.89.2003
R9 42 2162745050 2.5E2.1439.30059
  767 2037127365 3E2.7.13.5.23.43.503
R9 42 2612381499 3E2.7.13.1511.2111
  809 2298420670 2.7.5.13.197.12821
B4 42 2819711426 2.7.17.11847527
  814 2332981816 2E3.11.23.283.4073
R9 42 2665327304 2E3.6983.47711
  841 2517082425 3E3.5E2.11.13.89.293
R9 42 2995064775 3E3.5E2.587.7559
  850 2631762064 2E4.29.53.103.1039
R9 42 2800033136 2E4.809.216319
  854 2672087608 2E3.17.29.37.18311
L1 42 2964345992 2E3.71.5218919
  869 2796129128 2E3.13.17.887.1783
R9 42 3192116632 2E3.1997.199807
  889 2944703025 3E3.5E2.11.17.41.569
R9 42 3467386575 3E3.5E2.151.34019
  927 3276399555 3E2.5.13.11.29.97.181
R9 42 3735288765 3E2.5.13.179.35671
  939 3393478725 3.5E2.7.13.47.71.149
R9 42 3806060475 3.5E2.7.1049.6911
  962 3513278192 2E4.41.43.59.2111
R9 42 3746257168 2E4.7919.29567
  972 3647562568 2E3.13.17.839.2459
R9 42 4163429432 2E3.1721.302399
  980 3710119780 2E2.227.5.17.53.907
R9 42 4741427996 2E2.227.71.73547
 1006 3963477872 2E4.41.43.71.1979
R9 42 4203499408 2E4.359.731807
 1036 4210837424 2E4.23.109.113.929
R9 42 4465839376 2E4.359.777479
 1042 4282854730 2.5.7.11.761.7309
R9 42 5342485430 2.5.1087.491489
 1045 4313390445 3E2.7.13.5.23.41.1117
R9 42 5531592339 3E2.7.13.1031.6551
 1068 4604839810 2.5.19.17.37.53.727
R9 42 5075347070 2.5.19.151.176903
 1078 4771436296 2E3.11.23.271.8699
R9 42 5451411704 2E3.7649.89087
 1079 4784209576 2E3.19.23.29.47189
L1 42 5408830424 2E3.197.3431999
 1095 4937340976 2E4.37.47.61.2909
R9 42 5264327504 2E4.5471.60139
 1143 5513127795 3E2.5.17.7.29.131.271
R9 42 6585084045 3E2.5.17.1087.7919
 1154 5619401456 2E4.29.79.83.1847
R9 42 5929859344 2E4.191.1940399
 1174 5885347545 3E3.5.7.11.257.2203
R9 42 7215933735 3E3.5.47.1137263
 1192 6067647728 2E4.29.41.313.1019
R9 42 6442489072 2E4.449.896783
 1205 6200951625 3E3.5E3.11.19.59.149
R9 42 7277448375 3E3.5E3.719.2999
 1217 6353438175 3E3.5E2.7.29.199.233
R9 42 7574241825 3E3.5E2.1151.9749
 1220 6386741384 2E3.37.23.71.73.181
R3 42 6878699896 2E3.37.701.33151
 1230 6589526450 2.5E2.13.23.29.15199
R9 42 7659561550 2.5E2.11969.12799
 1252 6908106488 2E3.19.23.223.8861
L1 42 7384527112 2E3.31.29776319
 1256 6999092624 2E4.19.149.191.809
R9 42 7464267376 2E4.20249.23039
 1264 7131782710 2.5.17.13.89.101.359
R9 42 7858790090 2.5.17.1223.37799
 1279 7390033144 2E3.13.17.491.8513
R9 42 8443963496 2E3.11351.92987
 1317 7983560655 3E2.5.17.7.29.101.509
R9 42 9545098545 3E2.5.17.2447.5099
 1401 9294561770 2.5.13.29.53.181.257
R9 42 9874755670 2.5.13.701.108359
 1424  9881488304 2E4.29.47.109.4157
R9 42 10535954896 2E4.5279.124739
 1427  9967523980 2E2.257.5.17.37.3083
R9 42 12890541236 2E2.257.107.117191
```

TOTAL NUMBER: 78

AMICABLE PAIRS OF TYPE (5,2):

```
  323 227443340 2E2.5.17.43.47.331
R9 52 302651764 2E2.1187.63743
  604 1067740245 3E3.5.11.13.19.41.71
R9 52 1370813355 3E3.5.2687.3779
  776 2084019740 2E2.5.11.107.223.397
R9 52 2768701924 2E2.647.1069823
  921 3202734465 3E3.5.7.17.31.59.109
R9 52 4096337535 3E3.5.439.69119
  969 3604491345 3.5.7.13.23.29.37.107
R9 52 4338226095 3.5.7.809.51071
 1316  7961973140 2E2.5.11.67.727.743
R9 52 10600838764 2E2.1637.1618943
```

TOTAL NUMBER: 6

AMICABLE PAIRS OF TYPE (2,3):

```
   54 1511930 2.5.7.21599
L1 23 1598470 2.5.19.47.179
   70 4246130 2.5.7.60659
L1 23 4488910 2.5.23.29.673
  145 20308995 3E3.5.7.21491
L1 23 20955645 3E3.5.17.23.397
  193 48641584 2E4.29.104831
L1 23 48852176 2E4.47.167.389
  221 80422335 3E3.5.7.85103
L1 23 82977345 3E3.5.11.71.787
  235 96304845 3.5.7E2.13.10079
L1 23 96747315 3.5.7E2.23.59.97
  239 103034776 2E3.13.990719
L1 23 105016424 2E3.29.47.9631
  322 226540432 2E4.23.615599
L1 23 231465968 2E4.59.359.683
  329 245618415 3E2.5.19.7.41039
W1 23 266560785 3E2.5.19.31.89.113
  415 397287345 3.5.7E2.13.41579
W1 23 399052815 3.5.7E2.17.109.293
  588 1002372250 2.5E3.11.364499
L1 23 1044659750 2.5E3.29.89.1619
  624 1141149196 2E2.11.19.1365011
W1 23 1152070964 2E2.11.43.53.11489
  707 1662154065 3E2.5.13.11.258299
L1 23 1722609135 3E2.5.13.29.59.1721
  865 2766512710 2.5.13.29.733823
W1 23 2781196730 2.5.13.53.103.3919
  987 3787638940 2E2.37.5.5118431
W1 23 4381378532 2E2.37.43.73.9431
 1018 4053148088 2E3.79.11.583019
W1 23 4342339912 2E3.79.107.157.409
 1072 4671243424 2E5.43.3394799
W1 23 4739142176 2E5.229.263.2459
 1210 6262961888 2E5.41.4773599
W1 23 6367983712 2E5.179.1019.1091
 1267 7194869650 2.5E2.19.43.176129
W1 23 7219609550 2.5E2.19.109.113.617
 1369 8902642875 3.5E3.7.17.199499
L1 23 9023629125 3.5E3.7.29.113.1049
 1412 9581473976 2E3.19.59.1068407
W1 23 9649870024 2E3.19.151.593.709
```

TOTAL NUMBER: 21

AMICABLE PAIRS OF TYPE (3,3):

```
   43 1077890 2.5.11.41.239
L1 33 1099390 2.5.17.29.223
   58 2236570 2.5.7.89.359
L1 33 2429030 2.5.23.59.179
   69 4238984 2E3.17.71.439
L1 33 4314616 2E3.23.131.179
   75 5123090 2.5.7.163.449
L1 33 5504110 2.5.19.59.491
   79 5385310 2.5.7.107.719
L1 33 5812130 2.5.17.179.191
   82 5730615 3E3.5.11.17.227
L1 33 6088905 3E3.5.23.37.53
   84 6329416 2E3.23.41.839
L1 33 6371384 2E3.19.167.251
   90 7489112 2E3.17.53.1039
L1 33 7674088 2E3.23.179.233
   95 8262136 2E3.17.79.769
L1 33 8369864 2E3.29.43.839
   96 8619765 3.5.11.7.17.439
L1 33 9627915 3.5.11.23.43.59
  103 9339704 2E3.11.211.503
L1 33 9892936 2E3.47.83.317
  105  9478910 2.5.7.19.7127
L1 33 11049730 2.5.71.79.197
  116 11252648 2E3.11.71.1801
L1 33 12101272 2E3.67.107.211
  124 13813150 2.5E2.13.79.269
L1 33 14310050 2.5E2.29.71.139
  126 14311688 2E3.17.47.2239
L1 33 14718712 2E3.23.167.479
  131 15363832 2E3.11.71.2459
L1 33 16517768 2E3.53.163.239
  132 15938055 3E2.5.7.19.2663
L1 33 17308665 3E2.5.11.73.479
  133 16137628 2E2.13.23.103.131
L1 33 16150628 2E2.13.31.43.233
  135 17041010 2.7.5.31.7853
L1 33 19150222 2.7.13.43.2447
  136 17257695 3.5.7.13.47.269
L1 33 17578785 3.5.7.23.29.251
  140 18056312 2E3.17.103.1289
L1 33 18166888 2E3.19.107.1117
  143 20014808 2E3.11.79.2879
L1 33 21457192 2E3.47.149.383
  146 21448630 2.5.7.131.2339
L1 33 23030090 2.5.19.53.2287
  152 23389695 3E3.5.7.53.467
L1 33 25132545 3E3.5.17.47.233
  157 26090325 3E2.5E2.17.19.359
L1 33 26138475 3E2.5E2.11.59.179
  158 28118032 2E4.47.139.269
L1 33 28128368 2E4.59.83.359
  159 28608424 2E3.13.139.1979
L1 33 29603576 2E3.23.349.461
  163 31818952 2E3.11.41.8819
L1 33 34860248 2E3.97.167.269
  167 33501825 3E2.5E2.7.89.239
L1 33 36136575 3E2.5E2.19.79.107
  169 34364912 2E4.43.199.251
L1 33 34380688 2E4.47.131.349
  170 34765731 3E2.7.13.11.17.227
L1 33 36939357 3E2.7.13.23.37.53
  180 38637016 2E3.11.359.1223
L1 33 40678184 2E3.29.271.647
  182 38783992 2E3.13.37.10079
L1 33 41654408 2E3.47.139.797
  185 44139856 2E4.29.251.379
L1 33 44916944 2E4.83.149.227
  186 45263384 2E3.17.59.5641
L1 33 46137016 2E3.19.433.701
  189 46521405 3E3.5.7.19.2591
L1 33 53011395 3E3.5.31.53.239
  192 48639032 2E3.13.29.16127
L1 33 52967368 2E3.59.293.383
  195 50997596 2E2.13.19.71.727
L1 33 51737764 2E2.13.23.181.239
  202 63560025 3E3.5E2.17.29.191
L1 33 65003175 3E3.5E2.23.53.79
  206 67729064 2E3.13.431.1511
L1 33 69439576 2E3.23.107.3527
  211 72958556 2E2.11.19.197.443
L1 33 74733604 2E2.11.53.73.439
  212 73032872 2E3.11.71.11689
L1 33 78469528 2E3.59.83.2003
  217 75226888 2E3.11.59.14489
L1 33 81265112 2E3.53.137.1399
  223 83135650 2.5E2.13.79.1619
L1 33 85603550 2.5E2.19.251.359
  226 86158220 2E2.5.41.105071
L1 33 99188788 2E2.23.43.25073
  231 91996816 2E4.29.331.599
L1 33 93259184 2E4.79.89.829
  240 104887448 2E3.19.71.9719
L1 33 105064552 2E3.23.47.12149
  244 114944072 2E3.17.19.44483
R3 33 125269528 2E3.53.439.673
  248 116654896 2E4.23.359.883
L1 33 120115664 2E4.101.239.311
  258 134312152 2E3.13.127.10169
L1 33 139057448 2E3.23.223.3389
  262 137424188 2E2.11.19.89.1847
R9 33 141993412 2E2.11.59.83.659
  275 155797390 2.5.7.863.2579
L1 33 165195890 2.5.23.29.24767
  279 162936904 2E3.13.719.2179
R9 33 166679096 2E3.19.839.1307
  281 165323696 2E4.37.97.2879
R9 33 167155024 2E4.59.113.1567
  288 169884784 2E4.29.109.3359
R9 33 173843216 2E4.71.199.769
  295 181088985 3.5.7.11.83.1889
R9 33 184694055 3.5.7.13.269.503
  296 182702024 2E3.19.53.22679
L1 33 184713976 2E3.17.719.1889
  307 201168592 2E4.29.491.883
L1 33 203314448 2E4.67.89.2131
  318 216392216 2E3.19.53.26861
L1 33 218772184 2E3.17.659.2441
  326 238238864 2E4.41.47.7727
R9 33 244730224 2E4.97.137.1151
  328 242182930 2.5.11.19.115877
L1 33 258410030 2.5.17.61.24919
  338 258904646 2.7.13.11.79.1637
L1 33 269448634 2.7.13.23.59.1091
  339 260231192 2E3.13.659.3797
L1 33 266171608 2E3.19.593.2953
  345 271048340 2E2.5.17.797201
L1 33 331636372 2E2.41.73.27701
  351 275631376 2E4.43.53.7559
R9 33 281207984 2E4.83.107.1979
  354 281499435 3E3.5.7.89.3347
L1 33 297034965 3E3.5.17.29.4463
  355 285627615 3.5.7E2.13.167.179
R9 33 293528865 3.5.7E2.29.47.293
  358 287793350 2.5E2.13.41.10799
L1 33 302793850 2.5E2.23.251.1049
  361 295824376 2E3.19.53.36721
L1 33 299072024 2E3.17.601.3659
  365 302424784 2E4.53.71.5023
L1 33 303107888 2E4.47.107.3767
  379 319904235 3E4.5.7.19.5939
R9 33 370086165 3E4.5.43.79.269
  381 323401712 2E4.23.431.2039
R3 33 332270608 2E4.101.127.1619
  385 332573392 2E4.29.431.1663
R9 33 335955248 2E4.47.191.2339
  388 343175404 2E2.11.13.379.1583
R9 33 364682516 2E2.11.131.151.419
  401 364182075 3E4.5E2.17.71.149
R9 33 365012325 3E4.5E2.19.53.179
  402 370032676 2E2.17.13.19.22031
R9 33 407256284 2E2.17.67.71.1259
  407 382170512 2E4.41.83.7019
R9 33 385592848 2E4.59.97.4211
  413 395378272 2E5.103.139.863
R9 33 397151648 2E5.181.191.359
  417 404185672 2E3.11.1877.2447
L1 33 423336248 2E3.31.101.16901
  423 425948050 2.5E2.11.269.2879
R9 33 441853550 2.5E2.19.479.971
  426 427448510 2.5.17.19.59.2243
R9 33 445018690 2.5.17.67.89.439
  428 429035596 2E2.11.17.43.13339
R3 33 458447924 2E2.11.173.229.263
  429 430848592 2E4.29.67.13859
R9 33 445657808 2E4.131.149.1427
  433 438452624 2E4.29.179.5279
L1 33 445419376 2E4.47.499.1187
  434 439232624 2E4.37.53.13999
L1 33 451335376 2E4.89.151.2099
  435 442480816 2E4.19.971.1499
R9 33 461479184 2E4.179.269.599
  441 471696190 2.5.7.23.292979
R9 33 540842690 2.5.37.79.18503
  445 491373104 2E4.23.107.12479
R3 33 511419856 2E4.127.389.647
  450 509379344 2E4.23.347.3989
R9 33 523679536 2E4.83.179.2203
  451 512412550 2.5E2.13.73.10799
L1 33 528145850 2.5E2.19.167.3329
  452 514439224 2E3.13.89.55579
L1 33 536022776 2E3.29.97.23819
  454 520218704 2E4.29.71.15791
R9 33 537213616 2E4.107.167.1879
  457 526271456 2E5.79.179.1163
R9 33 529709344 2E5.193.199.431
  463 541114808 2E3.13.863.6029
L1 33 552968392 2E3.23.89.33767
  467 557346712 2E3.13.397.13499
R9 33 570983288 2E3.19.1049.3581
  471 573216416 2E5.79.197.1151
R9 33 576387424 2E5.131.359.383
  474 579980048 2E4.29.179.6983
R9 33 589141552 2E4.79.89.5237
  477 586200224 2E5.79.461.503
R9 33 587353696 2E5.131.167.839
  481 601020945 3E3.5.7.647.983
L1 33 623232495 3E3.5.17.23.11807
  487 625955024 2E4.29.47.28703
R9 33 655391536 2E4.239.367.467
  501 664747083 3E2.7E2.13.11.83.127
R9 33 673747893 3E2.7E2.13.17.31.223
  506 681310575 3E3.5E2.11.89.1031
R9 33 700743825 3E3.5E2.17.79.773
  509 685939088 2E4.29.503.2939
R9 33 692097712 2E4.41.349.3023
  513 698049512 2E3.17.19.270143
L1 33 760728088 2E3.47.1259.1607
  517 705280310 2.7.37.5.307.887
R9 33 791333578 2.7.37.17.73.1231
  523 752458216 2E3.17.19.291199
L1 33 820021784 2E3.47.1091.1999
  527 762662128 2E4.19.263.9539
R9 33 798845072 2E4.239.317.659
  533 788056335 3E2.5.11.17.71.1319
R9 33 813177585 3E2.5.11.31.197.269
  536 807964592 2E4.29.47.37049
R9 33 845947408 2E4.199.389.683
  537 821903384 2E3.29.41.71.1217
R9 33 835551016 2E3.29.97.107.347
  545 855737264 2E4.23.1259.1847
R3 33 876651856 2E4.97.107.5279
  547 857161935 3E2.5.31.7.61.1439
R9 33 925581105 3E2.5.31.19.47.743
  548 861314660 2E2.53.5.211.3851
R9 33 990788572 2E2.53.23.317.641
  550 870675856 2E4.23.313.7559
R9 33 895461104 2E4.83.179.3767
  554 894012525 3E3.5E2.7.431.439
R9 33 991581075 3E3.5E2.43.127.269
  562 916021964 2E2.13.11.59.27143
R9 33 999258676 2E2.13.79.347.701
  568 948760928 2E5.79.263.1427
R9 33 951278752 2E5.109.223.1223
  573  962951312 2E4.19.1693.1871
L1 33 1003172848 2E4.131.307.1559
  579  969473384 2E3.11.67.164429
L1 33 1043149816 2E3.53.101.24359
```

```
   583  991838384 2E4.23.167.16139
R9 33 1025532496 2E4.79.503.1613
   593 1020658815 3E2.5.11.19.47.2309
R9 33 1055014785 3E2.5.11.31.197.349
   596 1034955988 2E2.11.17.1049.1319
R3 33 1060676012 2E2.11.43.89.6299
   601 1049859195 3.5.7.11.191.4759
R9 33 1055812485 3.5.7.13.79.9791
   603 1066176716 2E2.11.19.251.5081
R9 33 1085338804 2E2.11.29.293.2903
   613 1093953735 3E3.5.7.89.13007
L1 33 1153828665 3E3.5.11.239.3251
   615 1101570165 3E3.5.17.23.41.509
R9 33 1119255435 3E3.5.17.29.67.251
   616 1110676384 2E5.97.179.1999
R9 33 1111963616 2E5.83.499.839
   626 1162074914 2.7.11.13.43.13499
L1 33 1232933086 2.7.11.29.359.769
   630 1193945522 2.7.11.19.53.7699
L1 33 1201062478 2.7.11.17.149.3079
   634 1211220868 2E2.13.11.181.11699
R9 33 1292953532 2E2.13.41.389.1559
   642 1239061725 3E3.5E2.11.19.8783
R9 33 1375056675 3E3.5E2.47.89.487
   644 1241180168 2E3.19.59.138401
L1 33 1250055832 2E3.17.263.34949
   658 1292286248 2E3.11.499.29429
L1 33 1356413752 2E3.29.149.39239
   660 1305577305 3E3.5.19.17.79.379
R9 33 1320982695 3E3.5.19.31.37.449
   662 1312909796 2E2.11.17.109.16103
R3 33 1365507484 2E2.11.43.269.2683
   663 1321560765 3E4.5.7.59.7901
R9 33 1432128195 3E4.5.17.79.2633
   666 1333290105 3E3.5.7.23.61343
R3 33 1493441415 3E3.5.17.191.3407
   672 1365633296 2E4.37.107.21559
L1 33 1377316144 2E4.43.227.8819
   680 1448998330 2.5.19.13.569.1031
R9 33 1515731270 2.5.19.37.251.859
   686 1505175008 2E5.71.167.3967
R9 33 1518631456 2E5.127.433.863
   690 1528753832 2E3.17.19.591623
L1 33 1666015768 2E3.47.809.5477
   691 1532931010 2.5.13.29.79.5147
R9 33 1580579390 2.5.13.107.199.571
   698 1563999255 3E2.7.13.5.167.2287
R9 33 1793979369 3E2.7.13.23.131.727
   699 1574216272 2E4.19.971.5333
R9 33 1640265488 2E4.107.761.1259
   706 1626481616 2E4.23.149.29663
R9 33 1684020784 2E4.107.199.4943
   712 1690397588 2E2.11E2.29.83.1451
R9 33 1716168652 2E2.11E2.41.197.439
   716 1728342296 2E3.19.53.214541
L1 33 1747238104 2E3.17.521.24659
   728 1786141665 3E3.5.7.11.171827
R9 33 2172775455 3E3.5.47.443.773
   730 1793313730 2.5.31.13.479.929
R9 33 1806455870 2.5.31.17.79.4339
```

```
   735 1819124752 2E4.19.593.10091
R9 33 1897557008 2E4.131.347.2609
   736 1829456590 2.5.13.29.127.3821
R9 33 1869016370 2.5.13.97.103.1439
   742 1888560272 2E4.29.107.38039
R9 33 1932177328 2E4.53.719.3169
   744 1892277488 2E4.19.739.8423
R9 33 1972653712 2E4.107.1039.1109
   752 1954734364 2E2.11.19.593.3943
R9 33 1981062116 2E2.11.43.59.17747
   766 2033951985 3E3.5.41.13.23.1229
R9 33 2131910415 3E3.5.41.17.139.163
   770 2049829364 2E2.11.19.263.9323
R9 33 2085551116 2E2.11.47.59.17093
   772 2067555105 3E3.5.7.11.198899
R9 33 2515100895 3E3.5.47.389.1019
   773 2070206050 2.5E2.11.239.15749
R9 33 2148273950 2.5E2.19.359.6299
   774 2083300808 2E3.23.43.179.1471
R9 33 2113665592 2E3.23.137.191.439
   778 2099037232 2E4.37.89.39839
L2 33 2124799568 2E4.59.113.19919
   786 2141689095 3E2.7.13.5.31.16871
R9 33 2574912249 3E2.7.13.47.151.443
   789 2154386325 3.5E2.7.13.479.659
R9 33 2245332075 3.5E2.7.43.79.1259
   799 2232676016 2E4.19.2551.2879
L1 33 2324175184 2E4.127.263.4349
   802 2264629070 2.5.11.101.103.1979
R9 33 2272200370 2.5.11.79.373.701
   804 2270966698 2.7.11.13.191.5939
L1 33 2327448662 2.7.11.19.307.2591
   808 2294183672 2E3.11.227.114847
L1 33 2419178248 2E3.31.151.64601
   827 2436224288 2E5.53.307.4679
R9 33 2467554592 2E5.167.389.1187
   837 2498633150 2.5E2.13.149.25799
R9 33 2540106850 2.5E2.17.139.21499
   844 2555923990 2.5.17.23.29.22541
R9 33 2702673770 2.5.17.59.467.577
   851 2648872395 3E3.5.23.13.137.479
R9 33 2692721205 3E3.5.23.17.139.367
   856 2688000928 2E5.71.107.11057
R9 33 2729180576 2E5.193.647.683
   862 2732700555 3E2.5.13.19.47.5231
R9 33 2752109685 3E2.5.13.17.127.2179
   863 2733105848 2E3.11.139.223439
L1 33 2897582152 2E3.31.251.46549
   864 2750817650 2.5E2.7.599.13121
R9 33 3106843150 2.5E2.89.809.863
   868 2794450516 2E2.11.13.197.24799
R9 33 2980179884 2E2.11.79.659.1301
   870 2807410016 2E5.47.643.2903
R9 33 2848002208 2E5.197.367.1231
   872 2816751938 2.7.11.13.19.74051
R9 33 3154801342 2.7.11.167.241.509
   878 2870595525 3.5E2.7.19.41.7019
R9 33 2979030075 3.5E2.7.29.389.503
   882 2894107455 3E3.5.17.19.31.2141
R9 33 3028094145 3E3.5.17.47.67.419
```

```
   884 2897960164 2E2.11E2.23.439.593
R9 33 2941867676 2E2.11E2.59.71.1451
   894 2978701744 2E4.19.971.10091
L2 33 3103141136 2E4.173.179.6263
   903 3020065808 2E4.19.223.44549
L1 33 3167038192 2E4.197.349.2879
   905 3034523630 2.5.23.17.19.40847
R9 33 3318157330 2.5.23.73.229.863
   906 3036257456 2E4.19.439.22751
L1 33 3170488144 2E4.157.263.4799
   914 3123806972 2E2.11.13.431.12671
R9 33 3313974532 2E2.11.83.191.4751
   915 3124943756 2E2.11.19.1259.2969
L1 33 3161952244 2E2.11.29.149.16631
   922 3216365570 2.5.11.47.769.809
R9 33 3250156030 2.5.11.107.461.599
   926 3274564293 3E3.7.11.13.17.7127
R9 33 3623058747 3E3.7.11.53.131.251
   930 3312096496 2E4.29.661.10799
L1 33 3337031504 2E4.59.89.39719
   936 3373569544 2E3.41.31.71.4673
R9 33 3410834936 2E3.41.37.127.2213
   938 3382872670 2.5.19.17.179.5851
R9 33 3442900130 2.5.19.23.461.1709
   941 3401192925 3E2.5E2.13.41.79.359
R9 33 3423370275 3E2.5E2.13.59.83.239
   942 3407059832 2E3.11.911.42499
L1 33 3569740168 2E3.37.67.179999
   943 3408254632 2E3.23.47.229.1721
R9 33 3435662168 2E3.23.71.409.643
   945 3414281456 2E4.19.163.68903
L1 33 3591877264 2E4.263.409.2087
   948 3431450912 2E5.43.1439.1733
R9 33 3490122208 2E5.269.373.1087
   949 3434398695 3E2.7.13.5.191.4391
R9 33 3932355609 3E2.7.13.23.107.1951
   951 3437839568 2E4.29.659.11243
L1 33 3463727632 2E4.59.89.41227
   952 3437861427 3E3.7.11.13.131.971
R9 33 3459761613 3E3.7.11.17.53.1847
   967 3597402050 2.5E2.11.19.344249
R9 33 4086257950 2.5E2.149.269.2039
   970 3611920304 2E4.29.593.13127
L1 33 3640249456 2E4.53.109.39383
   975 3663942220 2E2.5.71.2580241
L1 33 4138709588 2E2.13.3163.25163
   982 3736912936 2E3.17.43.639007
L1 33 3854502104 2E3.23.151.138731
   984 3743928045 3E2.5.13.11.223.2609
R9 33 3917194515 3E2.5.13.23.347.839
   985 3751290650 2.5E2.19.29.136163
L1 33 3846660550 2.5E2.17.349.12967
   986 3762853094 2.7.11.13.373.5039
R9 33 3837305626 2.7.11.19.167.7853
   990 3804517244 2E2.11.17.367.13859
R9 33 3907408516 2E2.11.31.809.3541
  1011 4007609528 2E3.13.29.1328783
R9 33 4363729672 2E3.61.151.59219
  1016 4048940048 2E4.17.1451.10259
R9 33 4263876112 2E4.241.683.1619
```

```
  1019 4056852735 3E3.5.19.13.89.1367
R9 33 4216811265 3E3.5.19.29.83.683
  1035 4189882288 2E4.17.2399.6421
R9 33 4410460112 2E4.239.569.2027
  1044 4312833832 2E3.29.31.521.1151
R9 33 4346519768 2E3.29.47.191.2087
  1055 4414931650 2.5E2.31.23.59.2099
R9 33 4584492350 2.5E2.31.89.167.199
  1059 4488453968 2E4.17.2351.7019
R9 33 4724706352 2E4.223.701.1889
  1060 4490950220 2E2.5.71.3162641
L1 33 5072879188 2E2.13.3083.31643
  1067 4594486048 2E5.53.463.5851
R9 33 4643059808 2E5.173.223.3761
  1086 4859601232 2E4.17.2939.6079
R9 33 5114760368 2E4.227.599.2351
  1089 4878141590 2.7E2.5.233.42727
R9 33 5380167562 2.7E2.11.653.7643
  1092 4903965044 2E2.11.17.1129.5807
R9 33 5019351436 2E2.11.29.1451.2711
  1098 4967430490 2.5.19.11.139.17099
R9 33 5374649510 2.5.19.113.167.1499
  1107 5088028550 2.5E2.11.499.18539
R9 33 5257291450 2.5E2.19.199.27809
  1109 5113096443 3E2.7E2.13.17.23.2281
R9 33 5113841733 3E2.7E2.13.11.83.977
  1112 5156687470 2.5.11.53.419.2111
R9 33 5189747090 2.5.11.131.139.2591
  1118 5200799264 2E5.53.1439.2131
R9 33 5243612896 2E5.107.491.3119
  1122 5290961056 2E5.67.199.12401
R9 33 5335072544 2E5.149.211.5303
  1125 5302349776 2E4.17.2267.8599
R9 33 5581328624 2E4.257.449.3023
  1131 5389403950 2.5E2.7.1999.7703
R9 33 6074148050 2.5E2.79.641.2399
  1136 5447262776 2E3.23.47.83.7589
R9 33 5569774024 2E3.23.179.263.643
  1150 5587409230 2.5.13.19.1451.1559
R9 33 5828795570 2.5.13.199.233.967
  1151 5592854630 2.5.19.11.569.4703
R9 33 5990274970 2.5.19.71.167.2659
  1156 5668081984 2E6.223.311.1277
R9 33 5675159744 2E6.283.431.727
  1163 5766520288 2E5.59.599.5099
R9 33 5800279712 2E5.101.359.4999
  1166 5797844128 2E5.79.181.12671
R9 33 5825928032 2E5.83.1319.1663
  1173 5871076575 3.5E2.7.13.79.10889
R9 33 6228149025 3.5E2.7.43.263.1049
  1178 5924391392 2E5.43.443.9719
R9 33 6038673568 2E5.263.647.1109
  1180 5936514512 2E4.17.659.33119
R9 33 6260919088 2E4.263.919.1619
  1211 6275937424 2E4.19.509.40559
L1 33 6549134576 2E4.179.199.11491
  1214 6305672368 2E4.17.751.30869
R9 33 6647873552 2E4.251.839.1973
  1216 6343170730 2.5.17.13.67.42839
R9 33 6870741590 2.5.17.271.293.509
```

```
1223 6460278688 2E5.61.199.16631
R9 33 6532639712 2E5.139.359.4091
1225 6506173275 3.5E2.7.17.599.1217
R9 33 6542991525 3.5E2.7.19.521.1259
1232 6682859001 3E2.7.13.17.23.41.509
R9 33 6790149639 3E2.7.13.17.29.67.251
1238 6742313936 2E4.29.47.309167
R9 33 7058945584 2E4.151.431.6779
1241 6768593968 2E4.29.2089.6983
L2 33 6806206832 2E4.37.439.26189
1242 6771898208 2E5.71.151.19739
R9 33 6838279072 2E5.113.563.3359
1247 6845195390 2.5.11.53.139.8447
R9 33 6950050690 2.5.11.167.239.1583
1253 6921765752 2E3.11.79.995651
L1 33 7415623048 2E3.53.83.210719
1260 7096666610 2.5.11.53.719.1693
R9 33 7129680910 2.5.11.83.269.2903
1261 7107900496 2E4.23.79.244493
L2 33 7444382384 2E4.191.281.8669
1262 7125887110 2.5.17.19.103.21419
R9 33 7309479290 2.5.17.29.1039.1427
1263 7127201475 3E3.5E2.31.23.59.251
R9 33 7271876925 3E3.5E2.31.53.79.83
1274 7335940912 2E4.17.349.77279
R9 33 7756843088 2E4.419.1049.1103
1276 7336566710 2.5.19.11.83.42293
R9 33 8011080010 2.5.19.151.293.953
1278 7353700965 3E3.5.13.17.103.2393
R9 33 7704367515 3E3.5.13.83.227.233
1280 7393819030 2.5.19.13.227.13187
R9 33 7760775530 2.5.19.37.313.3527
1282 7460005875 3.5E3.7.17.349.479
R9 33 7635802125 3.5E3.7.47.59.1049
1283 7480768832 2E6.233.239.2099
R9 33 7497103168 2E6.269.599.727
1290 7572722157 3E4.7.11.13.59.1583
R9 33 7883062803 3E4.7.11.23.179.307
1292 7591540816 2E4.23.3533.5839
R9 33 7763547824 2E4.71.151.45259
1295 7608153350 2.5E2.7.179.121439
R9 33 8655091450 2.5E2.137.383.3299
1308 7807697504 2E5.59.1847.2239
R9 33 7839688096 2E5.109.223.10079
1312 7920502317 3E2.7.13.19.17.79.379
R9 33 8013961683 3E2.7.13.19.31.37.449
1314 7941148664 2E3.97.17.193.3119
R9 33 8074560136 2E3.97.23.389.1163
1327 8201184795 3E4.5.17.19.71.883
R9 33 8433856485 3E4.5.17.47.67.389
1330 8249841116 2E2.11.19.89.110879
R9 33 8515214884 2E2.11.59.71.46199
1336 8283367504 2E4.17.1439.21163
R9 33 8722329776 2E4.263.443.4679
1340 8348580350 2.5E2.11.3163.4799
L1 33 8600334850 2.5E2.17.2239.4519
1343 8452751584 2E5.59.1511.2963
R9 33 8487575456 2E5.79.1481.2267
1352 8517106125 3E3.5E3.11.383.599
R9 33 8735245875 3E3.5E3.29.31.2879
1360 8658321632 2E5.71.79.48239
R9 33 8847009568 2E5.401.599.1151
1385 9083125275 3.5E2.7.19.139.6551
R9 33 9115709925 3.5E2.7.29.47.12739
1388 9100969376 2E5.79.113.31859
R9 33 9204512224 2E5.179.227.7079
1393 9173012056 2E3.13.8689.10151
B4 33 9353372744 2E3.19.281.218987
1395 9225491168 2E5.83.151.23003
R9 33 9278558368 2E5.113.251.10223
1396 9251688032 2E5.67.179.24107
R9 33 9338472928 2E5.101.1229.2351
1402 9303632390 2.5.13.29.113.21839
R9 33 9518953210 2.5.13.59.359.3457
1421  9852159848 2E3.31.23.433.3989
R9 33 10096563352 2E3.31.61.251.2659
1422  9875558210 2.5.29.7.233.20879
R9 33 11231616190 2.5.29.239.347.467
1425  9883587230 2.5.11.47.191.10009
R9 33 10042879330 2.5.11.127.571.1259
1426 9958985128 2E3.19.103.197.3229
R9 33 9994662872 2E3.19.113.659.883

TOTAL NUMBER:  280
```

AMICABLE PAIRS OF TYPE (4,3):

```
36 667964 2E2.11.17.19.47
L1 43 783556 2E2.31.71.89
53 1468324 2E2.11.13.17.151
L1 43 1749212 2E2.37.53.223
61 2728726 2.7.11.13.29.47
L1 43 3077354 2.7.19.23.503
89 7288930 2.11.5.23.43.67
L1 43 8221598 2.11.7.197.271
97  8666860 2E2.5.23.83.227
L1 43 10638356 2E2.47.71.797
99  8826070 2.5.11.19.41.103
L1 43 10043690 2.5.31.179.181
108  9773505 3E2.5.7.19.23.71
L1 43 11791935 3E2.5.31.79.107
115 11173460 2E2.5.53.83.127
L1 43 13212076 2E2.31.47.2267
127 14426230 2.7.5.13.83.191
L1 43 18087818 2.7.31.71.587
141 18194715 3E2.5.7.11.59.89
L1 43 22240485 3E2.5.31.107.149
154 24472180 2E2.5.17.167.431
L1 43 30395276 2E2.47.107.1511
184 43096904 2E3.17.41.59.131
L1 43 46715896 2E3.53.239.461
209 71015260 2E2.5.23.263.587
L1 43 85458596 2E2.41.47.11087
210 71241830 2.5.11.19.89.383
L1 43 78057370 2.5.17.359.1279
214 74386305 3E2.5.7.17.29.479
L1 43 87354495 3E2.5.19.71.1439
219 78447010 2.5.17.19.149.163
L1 43 80960990 2.5.11.491.1499
225 84591405 3E3.5.17.29.31.41
L1 43 89590995 3E3.5.13.71.719
227  87998470 2.5.7.29.67.647
L1 43 102358010 2.5.47.89.2447
264 139009990 2.5.7.53.89.421
R3 43 156322490 2.5.23.179.3797
265 140744835 3E2.5.7.11.151.269
R9 43 166562685 3E2.5.17.239.911
266 140815384 2E3.19.23.47.857
R9 43 155709416 2E3.89.383.571
267 144788020 2E2.5.13.97.5741
R9 43 186088988 2E2.83.293.1913
272 153015550 2.5E2.19.23.47.149
R9 43 168392450 2.5E2.79.89.479
280 164733752 2E3.31.53.83.151
R9 43 166212808 2E3.17.383.3191
282 165742395 3.5.7.13.29.53.79
R9 43 182622405 3.5.7.41.59.719
289 170566690 2.5.7.29.73.1151
R9 43 197704670 2.5.31.739.863
300 189406984 2E3.13.71.113.227
R9 43 203592056 2E3.37.797.863
311 204756904 2E3.11.59.113.349
L1 43 226163096 2E3.79.449.797
314 209027128 2E3.23.29.43.911
R9 43 224355272 2E3.37.383.1979
315 209309704 2E3.29.71.97.131
R9 43 209816696 2E3.19.83.16631
319 221397165 3E3.5.11.29.53.97
R9 43 235831635 3E3.5.13.83.1619
331 250876395 3E2.5.7.11.17.4259
L1 43 323303445 3E2.5.53.283.479
333 252551048 2E3.17.31.37.1619
R9 43 279327352 2E3.107.179.1823
353 278247976 2E3.17.41.139.359
L1 43 293288024 2E3.31.149.7937
363 300208696 2E3.23.29.127.443
L1 43 313576904 2E3.31.89.14207
368 305178874 2.7.19.11.13.71.113
R9 43 356714246 2.7.19.83.107.151
374 312090808 2E3.19.29.101.701
R9 43 332345192 2E3.53.67.11699
376 318323864 2E3.23.61.79.359
R9 43 324492136 2E3.29.47.29759
382 324644792 2E3.19.29.47.1567
R9 43 352731208 2E3.79.89.6271
387 339981512 2E3.13.41.71.1123
R9 43 373803448 2E3.83.167.3371
391 347401035 3E3.5.17.19.31.257
R9 43 365917365 3E3.5.11.239.1031
405 375401624 2E3.13.73.197.251
R3 43 399982216 2E3.43.97.11987
409 388904355 3E3.5.7.23.29.617
R9 43 465418845 3E3.5.59.71.823
418 405370035 3E3.5.7.19.107.211
R9 43 473836365 3E3.5.29.127.953
432 438362984 2E3.19.43.47.1427
R9 43 466417816 2E3.31.503.3739
442 474179596 2E2.31.11.41.61.139
R9 43 505757684 2E2.31.17.79.3037
459 529714744 2E3.13.59.131.659
R9 43 567997256 2E3.47.109.13859
469 558410475 3.5E2.19.7.17.37.89
R9 43 662939925 3.5E2.19.23.113.179
470 559334930 2.7.5.11.23.31583
R9 43 750516718 2.7.71.281.2687
475 585057992 2E3.17.23.359.521
R9 43 632663608 2E3.59.107.12527
480 600418910 2.7.5.13.23.28687
R9 43 787621282 2.7.43.223.5867
485 613290028 2E2.17.13.29.47.509
R9 43 682191572 2E2.17.71.101.1399
496 653078426 2.7.31.11.13.17.619
R9 43 786829414 2.7.31.53.79.433
512 698002450 2.5E2.29.41.59.199
R9 43 708157550 2.5E2.19.71.10499
539 826499835 3E3.5.7.31.89.317
R9 43 931912965 3E3.5.23.59.5087
543 848764124 2E2.19.13.23.41.911
R9 43 953056036 2E2.19.47.251.1063
544 854687570 2.5.11.59.79.1667
R9 43 874694830 2.5.19.23.200159
553 891089368 2E3.13.23.401.929
R9 43 993165032 2E3.167.179.4153
555 894690615 3.5.7.13.53.83.149
R9 43 934224585 3.5.7.19.59.7937
```

558	905196776	2E3.11.31.389.853
R9 43	1013228824	2E3.139.487.1871
565	930793204	2E2.19.11.59.113.167
R9 43	999728396	2E2.19.23.239.2393
571	954392504	2E3.13.37.197.1259
R9 43	1036457896	2E3.43.1619.1861
572	957871508	2E2.11.29.71.97.109
R9 43	998051692	2E2.11.53.139.3079
580	969642056	2E3.17.31.349.659
R9 43	1026197944	2E3.29.383.11549
587	1000233608	2E3.11.59.383.503
L1 43	1089955192	2E3.47.863.3359
608	1086272836	2E2.11.29.47.59.307
R9 43	1149067964	2E2.11.89.139.2111
610	1088205734	2.7.11.17.19.131.167
R9 43	1211001946	2.7.11.179.197.223
625	1148440336	2E4.37.71.89.307
R9 43	1202659184	2E4.167.659.683
632	1197281380	2E2.5.31.967.1997
R9 43	1402100636	2E2.17.2441.8447
633	1206344152	2E3.13.37.251.1249
R9 43	1307355848	2E3.41.1499.2659
639	1224145112	2E3.17.31.103.2819
R9 43	1309794088	2E3.53.79.39103
645	1241809540	2E2.5.17.37.98713
R9 43	1594046252	2E2.113.131.26921
649	1255307438	2.7.11.17.53.83.109
R9 43	1331301202	2.7.11.29.307.971
652	1273481176	2E3.11.29.569.877
R9 43	1429002824	2E3.179.379.2633
653	1273666394	2.7.11.13.41.59.263
R9 43	1408742566	2.7.11.83.307.359
654	1275751408	2E4.41.79.103.239
R9 43	1324082192	2E4.89.727.1279
668	1347375272	2E3.19.89.137.727
R9 43	1365152728	2E3.29.41.143519
674	1386737770	2.5.11.17.59.12569
R9 43	1545591830	2.5.29.53.100559
675	1395217845	3E3.5.7.53.89.313
R9 43	1534778955	3E3.5.17.71.9419
679	1448711355	3.5.7.13.17.149.419
R9 43	1599480645	3.5.7.29.139.3779
683	1470622335	3.5.7.13.29.97.383
R9 43	1564022145	3.5.7.19.127.6173
692	1546818128	2E4.47.109.113.167
R9 43	1587981232	2E4.83.151.7919
693	1548287895	3.5.7.11.23.167.349
R9 43	1703116905	3.5.7.31.89.5879
696	1559105008	2E4.43.67.149.227
R9 43	1613013392	2E4.109.179.5167
697	1559592628	2E2.11.43.53.103.151
R9 43	1595431244	2E2.11.31.311.3761
702	1600185752	2E3.11.53.103.3331
R9 43	1768066408	2E3.101.167.13103
720	1755729656	2E3.19.23.349.1439
R9 43	1873070344	2E3.31.1249.6047
721	1756703660	2E2.5.23.31.123191
L1 43	2216977492	2E2.53.191.54751
722	1763439656	2E3.11.29.251.2753
R9 43	1984203544	2E3.179.971.1427

733	1813297395	3.5.7.13.19.139.503
R9 43	1980008205	3.5.7.29.79.8231
750	1937813620	2E2.5.97.631.1583
R9 43	2182664588	2E2.13.593.70783
751	1938775850	2.5E2.11.47.179.419
R9 43	2110964950	2.5E2.41.149.6911
762	1992605368	2E3.13.23.131.6359
R9 43	2238575432	2E3.179.461.3391
763	2004732340	2E2.5.13.227.33967
R9 43	2549153612	2E2.71.151.59443
764	2008888310	2.11.13.5.23.103.593
R9 43	2474566666	2.11.13.43.311.647
771	2057011288	2E3.17.19.431.1847
R9 43	2254003112	2E3.83.127.26729
780	2107566279	3E2.7.13.17.19.31.257
R9 43	2219898681	3E2.7.13.11.239.1031
788	2153378296	2E3.29.31.227.1319
R9 43	2180445704	2E3.17.911.17599
800	2241281620	2E2.5.131.881.971
R9 43	2511611756	2E2.17.47.785861
806	2278650296	2E3.13.23.199.4787
R9 43	2547653704	2E3.113.839.3359
816	2363563444	2E2.19.11.23.83.1481
R9 43	2655792716	2E2.19.47.233.3191
821	2407445150	2.5E2.11.29.149.1013
R9 43	2684862850	2.5E2.59.449.2027
823	2417154916	2E2.11.23.47.89.571
R9 43	2564461724	2E2.11.107.127.4289
824	2419787565	3E2.5.13.17.23.71.149
R9 43	2675047635	3E2.5.13.89.191.269
842	2550651220	2E2.5.13.131.74887
R9 43	3261855788	2E2.73.223.50093
845	2592552904	2E3.17.29.43.15287
R9 43	2856090296	2E3.103.131.26459
858	2710037704	2E3.11.29.181.5867
R9 43	3057032696	2E3.233.719.2281
866	2784657488	2E4.29.71.181.467
R9 43	2918727472	2E4.223.269.3041
867	2787570220	2E2.5.31.601.7481
R9 43	3266026196	2E2.17.4987.9631
881	2881000792	2E3.23.41.521.733
R9 43	2912196968	2E3.17.503.42571
885	2919883365	3E2.5.7.17.269.2027
R9 43	3230310555	3E2.5.19.23.164267
887	2932637168	2E4.37.67.107.691
R3 43	3054015376	2E4.101.683.2767
892	2957909284	2E2.11.19.43.107.769
R9 43	3189277916	2E2.11.197.263.1399
898	2997567034	2.7.11.19.47.71.307
R9 43	3133653446	2.7.11.23.479.1847
901	3001624450	2.5E2.11.47.83.1399
R9 43	3297972350	2.5E2.41.449.3583
904	3024860410	2.5.11.13.23.91969
R9 43	3649954310	2.5.67.1259.4327
913	3107420056	2E3.13.19.331.4751
R9 43	3518768744	2E3.461.719.1327
919	3152378344	2E3.23.31.419.1319
R9 43	3234309656	2E3.19.2687.7919
932	3334417196	2E2.11.17.53.241.349
R9 43	3581168404	2E2.11.109.769.971

935	3370176315	3E4.11.5.23.31.1061
R9 43	3735470277	3E4.11.7.47.12743
946	3415139192	2E3.19.47.71.6733
R9 43	3566672008	2E3.23.2729.7103
958	3474708976	2E4.67.109.131.227
R9 43	3503951504	2E4.37.1583.3739
966	3572444816	2E4.43.97.199.269
R9 43	3645843184	2E4.71.131.24499
973	3654203576	2E3.19.71.571.593
R9 43	3684785224	2E3.17.311.87119
974	3658862632	2E3.23.41.53.9151
R9 43	3813562328	2E3.43.47.235871
976	3679922740	2E2.5.13.67.211247
R9 43	4766617292	2E2.83.3671.3911
989	3804416572	2E2.11.43.71.127.223
R9 43	3825546692	2E2.11.31.83.33791
992	3846301096	2E3.11.59.727.1019
R9 43	4173346904	2E3.79.83.79559
997	3892163756	2E2.13.19.53.239.311
R9 43	4033135444	2E2.13.29.127.21059
999	3905117576	2E3.19.47.71.7699
R9 43	4078242424	2E3.23.2399.9239
1012	4023332270	2.5.19.23.37.149.167
R9 43	4250331730	2.5.19.47.179.2659
1013	4028769225	3E3.5E2.13.17.113.239
R9 43	4520683575	3E3.5E2.41.379.431
1021	4088056208	2E4.41.53.307.383
R9 43	4227411568	2E4.71.1231.3023
1022	4095021315	3.5.7.11.23.139.1109
R9 43	4497977085	3.5.7.31.83.16649
1024	4105247230	2.7.31.5.23.83.991
R9 43	5110162946	2.7.31.71.383.433
1028	4143353656	2E3.13.29.509.2699
R9 43	4531746344	2E3.53.499.21419
1029	4144376145	3.5.7E2.13.41.71.149
R9 43	4542971055	3.5.7E2.53.139.839
1034	4186831005	3E3.5.7.67.89.743
R9 43	4555466595	3E3.5.23.29.50591
1037	4211873505	3E3.5.7.17.23.11399
R9 43	5243742495	3E3.5.89.607.719
1041	4281566032	2E4.29.97.251.379
R9 43	4446000368	2E4.113.239.10289
1047	4331452790	2.7.41.5.47.163.197
R9 43	5095298698	2.7.41.23.107.3607
1054	4400527095	3E5.5.17.23.59.157
R9 43	4543739145	3E5.5.11.359.947
1061	4516391295	3E2.5.13.19.59.71.97
R9 43	4729791105	3E2.5.13.29.83.3359
1063	4569376424	2E3.19.43.83.8423
R9 43	4771154776	2E3.23.1871.13859
1071	4667500708	2E2.19.13.97.113.431
R9 43	4792055132	2E2.19.17.83.44687
1075	4721483056	2E4.23.139.241.383
R9 43	4957897424	2E4.197.439.3583
1082	4800749954	2.7.11.13.73.107.307
R9 43	5124163198	2.7.11.43.83.9323
1096	4960116850	2.5E2.13.89.179.479
R9 43	5164235150	2.5E2.19.863.6299
1099	4980118690	2.5.31.19.61.83.167
R9 43	5099236190	2.5.31.17.223.4339

1106	5063925616	2E4.43.71.83.1249
R9 43	5247914384	2E4.79.769.5399
1113	5157409576	2E3.11.37.179.8849
R9 43	5738710424	2E3.113.269.23599
1115	5188836656	2E4.59.61.251.359
R9 43	5272993744	2E4.53.199.31247
1126	5319472184	2E3.13.41.199.6269
R9 43	5740807816	2E3.37.3079.6299
1127	5321930128	2E4.29.53.379.571
R9 43	5593889072	2E4.197.569.3119
1128	5325459184	2E4.43.139.233.239
R9 43	5398854416	2E4.41.1559.5279
1129	5375620496	2E4.29.83.97.1439
R9 43	5648673904	2E4.199.503.3527
1130	5381495288	2E3.13.23.191.11779
R9 43	6017775112	2E3.127.433.13679
1146	5562037616	2E4.43.59.263.521
R9 43	5716169104	2E4.71.241.20879
1147	5574272535	3E2.5.13.19.43.107.109
R9 43	5841932265	3E2.5.13.23.449.967
1153	5609702696	2E3.13.29.107.17383
R9 43	6218370904	2E3.89.317.27551
1160	5725765580	2E2.5.17.467.36061
L1 43	7033258516	2E2.37.107.444131
1164	5771384168	2E3.11.103.599.1063
R9 43	6179463832	2E3.37.233.89599
1165	5797165010	2.7E2.5.13.881.1033
R9 43	7302630622	2.7E2.41.293.6203
1167	5806329830	2.5.7.29.59.48479
R9 43	6759686170	2.5.47.89.161599
1184	5990705656	2E3.13.59.71.13751
R9 43	6485108744	2E3.41.647.30559
1187	6024547696	2E4.29.83.311.503
R9 43	6259666064	2E4.107.293.12479
1188	6031567575	3E2.5E2.11.19.47.2729
R9 43	6642621225	3E2.5E2.17.167.10399
1189	6042829905	3E3.5.7.23.29.9587
R9 43	7211621295	3E3.5.31.1223.1409
1190	6045115850	2.5E2.17.41.89.1949
R9 43	6293938150	2.5E2.29.53.81899
1198	6135028624	2E4.59.73.127.701
R9 43	6232751216	2E4.47.359.23087
1203	6179700345	3.5.7.13.17.79.3371
R9 43	6872367495	3.5.7.47.59.23603
1204	6181674850	2.5E2.13.59.359.449
R9 43	6473765150	2.5E2.23.139.40499
1206	6217030755	3E2.5.13.19.23.83.293
R9 43	6727624605	3E2.5.13.41.179.1567
1222	6451021016	2E3.11.41.103.17359
R9 43	7198105384	2E3.97.1151.8059
1243	6777002584	2E3.11.37.233.8933
R9 43	7522400456	2E3.107.227.38713
1244	6788375248	2E4.41.109.139.683
R9 43	6926371952	2E4.47.2309.3989
1249	6885178846	2.7E2.19.13.23.83.149
R9 43	7593733154	2.7E2.19.31.293.449
1268	7268766832	2E4.53.61.83.1693
R9 43	7499850416	2E4.71.461.14321
1285	7483202870	2.5.11.13.1499.3491
R9 43	8356509130	2.5.19.3023.14549

```
1297 7644728944 2E4.67.83.151.569
R9 43 7696789136 2E4.37.607.21419
1301 7716789124 2E2.59.11.17.19.9203
R9 43 8982948476 2E2.59.29.103.12743
1303 7735239556 2E2.11.43.71.89.647
R9 43 7784412284 2E2.11.23.1759.4373
1307 7800706940 2E2.5.13.167.179657
L1 43 9946628932 2E2.53.1511.31051
1319 8038783948 2E2.13.17.19.307.1559
R9 43 8912550452 2E2.13.139.701.1759
1321 8056050244 2E2.11.29.53.139.857
R9 43 8289879356 2E2.11.43.107.40949
1325 8167602105 3E2.5.13.19.23.43.743
R9 43 8991299655 3E2.5.13.61.197.1279
1326 8188640048 2E4.41.47.349.761
R9 43 8479043152 2E4.97.239.22859
1328 8226127472 2E4.29.107.223.743
R9 43 8512801168 2E4.71.1889.3967
1347 8490604005 3E3.5.13.19.89.2861
R9 43 8818771995 3E3.5.11.83.71549
1353 8521860555 3E6.5.13.17.71.149
R9 43 9326392245 3E6.5.23.53.2099
1359 8651076434 2.7.11.13.23.89.2111
R9 43 9742585006 2.7.11.223.239.1187
1364 8808227056 2E4.59.71.113.1163
R9 43 8962421264 2E4.53.227.46559
1372 8952142815 3E3.5.7.11.53.16249
R9 43 11265457185 3E3.5.179.311.1499
1375 8975660265 3E2.5.13.11.47.59.503
R6 43 10045057815 3E2.5.13.107.383.419
1378 9006915928 2E3.17.59.317.3541
R9 43 9240051272 2E3.19.1931.31481
1379 9008575485 3.5.7.13.17.23.16879
R9 43 10592750595 3.5.7.127.269.2953
1381 9029724795 3E2.7.13.5.31.83.857
R9 43 11118146949 3E2.7.13.71.263.727
1386 9086970310 2.5.53.11.83.89.211
R9 43 9607155770 2.5.53.17.719.1483
1389 9136521225 3E3.5E2.13.17.73.839
R9 43 10287235575 3E3.5E2.59.97.2663
1410 9535950765 3E2.5.11.23.31.41.659
R9 43 10390515795 3E2.5.11.127.197.839
1415 9723053488 2E4.23.89.307.967
R9 43 10240668752 2E4.263.461.5279
```

TOTAL NUMBER: 201

AMICABLE PAIRS OF TYPE (5,3):

```
313 208693628 2E2.11.13.23.29.547
R9 53 255308932 2E2.31.167.12329
347 273141836 2E2.11.23.29.41.227
L1 53 306014644 2E2.13.239.24623
567 938304290 2.11.5.7.17.43.1667
R9 53 1344480478 2.11.31.197.10007
618 1118297565 3E2.5.7.11.29.31.359
R9 53 1469555235 3E2.5.79.479.863
723 1772982530 2.5.11.17.19.139.359
R9 53 2146121470 2.5.107.199.10079
843 2551781890 2.5.7.19.61.71.443
R9 53 3156424190 2.5.431.739.991
877 2848466620 2E2.5.17.31.131.2063
R9 53 3742595396 2E2.257.431.8447
931 3331018845 3E2.7.5.11.17.193.293
R9 53 4356521379 3E2.7.23.41.73331
1026 4123833752 2E3.17.53.61.83.113
R9 53 4532487208 2E3.71.227.35153
1062 4522539070 2.5.7.17.73.79.659
R9 53 5604923330 2.5.593.739.1279
1111 5131883330 2.5.7.17.103.149.281
R9 53 6270843070 2.5.107.1879.3119
1119 5221345844 2E2.11.13.19.353.1361
R9 53 6118775116 2E2.17.9439.9533
1218 6356368136 2E3.17.23.103.109.181
R9 53 7135510264 2E3.131.2027.3359
1240 6764433170 2.5.11.23.47.163.349
R9 53 7518523630 2.5.19.383.103319
1257 7035981610 2.5.7.53.109.127.137
R9 53 8073097430 2.5.29.197.141311
1350 8508118180 2E2.5.17.37.307.2203
R9 53 10993367516 2E2.131.167.125627
1354 8534619752 2E3.17.23.71.83.463
R9 53 9650022808 2E3.347.503.6911
1407 9408690824 2E3.13.41.59.149.251
R9 53 10595069176 2E3.167.1259.6299
```

TOTAL NUMBER: 18

AMICABLE PAIRS OF TYPE (2,4):

```
177 37784810 2.7.5.539783
L1 24 39944086 2.7.13.41.53.101
375 316293016 2E3.13.3041279
R9 24 322375784 2E3.41.71.109.127
484 606235455 3E3.5.7.641519
R9 24 625482945 3E3.5.19.43.53.107
685 1502495085 3.7E2.13.5.157247
R9 24 1509118611 3.7E2.13.11.17.41.103
```

TOTAL NUMBER: 4

AMICABLE PAIRS OF TYPE (3,4):

```
274 155578180 2E2.5.223.34883
R9 34 172610492 2E2.23.41.67.683
348 274638460 2E2.5.1693.8111
R9 34 302514116 2E2.17.43.307.337
357 287250632 2E3.17.127.16631
R9 34 287551288 2E3.31.53.131.167
416 400250565 3E4.11.5.13.6911
R9 34 442792251 3E4.11.17.23.31.41
479 596668490 2.5.11.41.132299
R9 34 603557110 2.5.13.53.251.349
490 637756665 3.5.7.13.59.7919
R9 34 639580935 3.5.7.29.41.47.109
502 665113060 2E2.5.31.1072763
R9 34 776681756 2E2.23.107.257.307
525 761197736 2E3.13.1151.6359
L1 34 777413464 2E3.41.47.211.239
570 950850140 2E2.5.1091.43577
R9 34 1047811252 2E2.17.41.233.1613
665 1327395368 2E3.13.1511.8447
R9 34 1355013592 2E3.41.43.191.503
871 2808979976 2E3.11.2393.13339
R9 34 2939492824 2E3.37.137.173.419
876 2847780584 2E3.11.557.58099
R9 34 2987783416 2E3.53.61.331.349
909 3065342660 2E2.5.9743.15731
R9 34 3372946876 2E2.13.107.347.1747
1043 4288758056 2E3.11.4513.10799
R9 34 4486457944 2E3.47.73.149.1097
1101 5001083252 2E2.11.19.1583.3779
R9 34 5057950348 2E2.11.59.107.131.139
1152 5607553016 2E3.13.149.361871
R9 34 5791414984 2E3.41.59.139.2153
1159 5715251290 2.5.7.53.1540499
R9 34 6263676710 2.5.23.89.157.1949
1176 5907430305 3E3.5.7.151.41399
R9 34 6174745695 3E3.5.17.31.229.379
1207 6249563650 2.5E2.11.449.25307
R9 34 6460113950 2.5E2.29.89.113.443
1208 6255734650 2.5E2.11.1487.7649
R9 34 6447916550 2.5E2.29.61.269.271
1302 7720248712 2E3.11.2819.31121
R9 34 8077278488 2E3.37.107.181.1409
1329 8237044408 2E3.17.47.1288649
R9 34 8463859592 2E3.43.53.109.4259
1357 8628307636 2E2.13.17.79.123551
R9 34 8807350604 2E2.13.31.131.179.233
1376 8990017384 2E3.17.59.1120391
R9 34 9160333016 2E3.37.53.103.5669
```

TOTAL NUMBER: 24

AMICABLE PAIRS OF TYPE (4,4):

```
165 32642324 2E2.11.13.149.383
L1 44 35095276 2E2.17.47.79.139
286 169335790 2.5.13.19.179.383
L1 44 179029010 2.5.23.59.79.167
294 180038452 2E2.11.19.31.6947
R9 44 193486028 2E2.23.29.47.1543
299 186878110 2.5.17.19.47.1231
R9 44 196323170 2.5.23.41.109.191
332 251302370 2.5.11.23.71.1399
R9 44 271244830 2.5.29.59.83.191
420 407641130 2.5.13.17.139.1327
R9 44 435691990 2.5.23.59.97.331
437 460122410 2.5.11.29.97.1487
R9 44 484817110 2.5.19.71.83.433
448 504555070 2.5.17.19.31.5039
R9 44 540539330 2.5.23.71.79.419
458 526552472 2E3.19.71.97.503
R9 44 540314728 2E3.41.83.89.223
476 586188070 2.5.13.41.71.1549
R9 44 594986330 2.5.19.29.83.1301
493 643006485 3E3.5.11.41.59.179
R9 44 663361515 3E3.5.23.29.53.139
505 677781140 2E2.5.227.337.443
R9 44 759308332 2E2.17.73.151.1013
534 802162790 2.5.11.13.167.3359
R9 44 904824730 2.5.47.89.97.223
546 856305272 2E3.23.29.383.419
R9 44 885518728 2E3.47.59.179.223
617 1112824370 2.5.7.59.227.1187
R9 44 1227440590 2.5.37.43.179.431
646 1249677032 2E3.23.67.167.607
R9 44 1250808088 2E3.31.37.271.503
746 1900066455 3E2.7.5.17.23.15427
R9 44 2258828649 3E2.7.11.83.173.227
756 1978830070 2.7.5.23.97.12671
R9 44 2313024266 2.7.31.41.43.3023
759 1990129570 2.5.11.13.431.3229
R9 44 2229439070 2.5.37.67.139.647
777 2091376035 3E2.5.7.29.179.1279
R9 44 2221711965 3E2.5.11.59.127.599
790 2158256590 2.7.5.17.151.12011
R9 44 2574279218 2.7.37.41.53.2287
795 2220015735 3E3.5.7.79.131.227
R9 44 2402729865 3E3.5.31.37.59.263
807 2282361092 2E2.11.19.239.11423
R9 44 2323795708 2E2.13.23.127.15299
822 2410351540 2E2.5.83.887.1637
R9 44 2721279692 2E2.17.73.293.1871
826 2428035470 2.5.7.53.359.1823
R9 44 2677997170 2.5.29.71.113.1151
835 2482324910 2.5.13.23.41.20249
R9 44 2661499090 2.5.17.149.179.587
836 2484011608 2E3.13.151.367.431
R9 44 2590502312 2E3.37.127.137.503
848 2614326776 2E3.17.61.79.3989
R9 44 2729081224 2E3.37.107.199.433
855 2682405256 2E3.19.107.131.1259
R9 44 2706362744 2E3.31.53.109.1889
```

```
859 2710902590 2.5.11.23.397.2699
R9 44 2859823810 2.5.17.59.239.1193
947 3425919050 2.5E2.17.103.109.359
R9 44 3468282550 2.5E2.29.59.71.571
953 3443251432 2E3.23.29.127.5081
R9 44 3582105368 2E3.43.83.109.1151
981 3715799048 2E3.13.53.223.3023
R9 44 3965644792 2E3.71.97.167.431
983 3737773292 2E2.31.11.61.167.269
R9 44 3821742868 2E2.31.17.53.79.433
998 3900906009 3E2.7.13.11.41.59.179
R9 44 4024393191 3E2.7.13.23.29.53.139
1001 3925579070 2.5.7.89.191.3299
R9 44 4285876930 2.5.19.199.263.431
1008 3980355350 2.5E2.17.59.139.571
R9 44 4062879850 2.5E2.23.131.149.181
1023 4104095930 2.5.11.47.139.5711
R9 44 4186986310 2.5.13.89.101.3583
1040 4280119305 3.5.7.11.59.107.587
R9 44 4498673655 3.5.7.31.53.89.293
1064 4570182110 2.5.13.23.479.3191
R9 44 4696321570 2.5.17.37.127.5879
1093 4911038510 2.5.7.149.479.983
R9 44 5291073490 2.5.29.31.409.1439
1104 5048426630 2.5.13.23.563.2999
R9 44 5184789370 2.5.17.31.349.2819
1117 5200086344 2E3.17.269.307.463
R9 44 5218198456 2E3.19.131.503.521
1132 5403806252 2E2.13.17.239.25577
L1 44 5424895828 2E2.11.23.521.10289
1141 5502084136 2E3.17.199.263.773
R9 44 5532059864 2E3.31.53.89.4729
1144 5546461305 3.7.11.5.47.83.1231
R9 44 5898483591 3.7.11.13.17.43.2687
1170 5849277512 2E3.13.179.223.1409
R9 44 6089474488 2E3.41.59.419.751
1185 5992992495 3E3.5.7.71.179.499
R9 44 6448607505 3E3.5.19.47.149.359
1194 6104216464 2E4.59.107.223.271
R9 44 6135000176 2E4.101.127.167.179
1200 6146662545 3E2.5.17.19.53.79.101
R9 44 6226508655 3E2.5.17.29.59.67.71
1213 6287302312 2E3.19.29.881.1619
R9 44 6572257688 2E3.41.89.149.1511
1235 6718067096 2E3.13.59.79.13859
R9 44 7252812904 2E3.83.131.199.419
1255 6960968212 2E2.19.11.37.139.1619
R9 44 7517943788 2E2.19.53.83.113.199
1258 7072796115 3E2.5.7.11.709.2879
R9 44 8238666285 3E2.5.19.79.283.431
1272 7317585748 2E2.19.11.71.113.1091
R9 44 7740482732 2E2.19.37.53.167.311
1356 8575844056 2E3.13.71.347.3347
R9 44 9040528424 2E3.53.61.431.811
1363 8804881305 3E3.5.11.37.191.839
R9 44 8845601895 3E3.5.13.29.151.1151
1373 8960679970 2.5.11.41.683.2909
R9 44 9096591710 2.5.17.37.71.20369
1392 9160950225 3.5E2.19.7.17.89.607
R9 44 10380656175 3.5E2.19.37.47.59.71
1400 9286443650 2.5E2.11.59.419.683
R9 44 9949825150 2.5E2.53.113.149.223
1403 9307840630 2.11.5.43.313.6287
R9 44 9457161098 2.11.7.17.523.6907
1404 9344815064 2E3.13.59.659.2311
R9 44 9881776936 2E3.67.79.109.2141
1408 9449054312 2E3.19.71.139.6299
R9 44 9602145688 2E3.29.59.179.3919
```

TOTAL NUMBER: 63

AMICABLE PAIRS OF TYPE (5,4):

```
811 2310786764 2E2.11.13.19.149.1427
R9 54 2727197236 2E2.29.79.139.2141
920 3188153956 2E2.13.17.31.317.367
R9 54 3417616796 2E2.11.137.211.2687
937 3381430228 2E2.7E2.2393
R3 54 3731017772 2E2.23.31.89.14699
1322 8077248916 2E2.11.19.59.83.1973
R9 54 8637003884 2E2.17.23.1879.2939
1368 8894283788 2E2.13.17.113.269.331
R9 54 9131961652 2E2.11.41.107.47309
1406 9374110636 2E2.11.19.53.83.2549
R9 54 10058113364 2E2.13.47.269.15299
1419 9836011130 2.5.11.17.79.139.479
R9 54 11065876870 2.5.31.107.149.2239
```

TOTAL NUMBER: 7

AMICABLE PAIRS OF TYPE (4,5):

```
586 996088412 2E2.11.17.151.8819
R9 45 1030959268 2E2.23.37.41.83.89
852 2655265756 2E2.11.13.199.23327
R9 45 2831479844 2E2.29.41.47.53.239
```

TOTAL NUMBER: 2

AMICABLE PAIRS OF TYPE (5,5):

```
278 161088158 2.7.11.17.37.1663
R9 55 166706530 2.5.23.31.103.227
316 211319745 3.7.5.13.23.53.127
R9 55 234587199 3.7.11.17.31.41.47
1365 8834761364 2E2.11.13.83.379.491
R9 55 9633895276 2E2.23.37.97.163.179
```

TOTAL NUMBER: 3

EXOTIC AMICABLE PAIRS:

```
2 1184 2E5.37
L1 X 1210 2.5.11E2
5 6232 2E3.19.41
L1 X 6368 2E5.199
7 12285 3E3.5.7.13
L1 X 14595 3.5.7.139
13 79750 2.5E3.11.29
L1 X 88730 2.5.19.467
16 122368 2E9.239
L1 X 123152 2E4.43.179
17 141664 2E5.19.233
L1 X 153176 2E3.41.467
23 280540 2E2.5.13E2.83
L1 X 365084 2E2.107.853
25 319550 2.7.5E2.11.83
L1 X 430402 2.7.71.433
28 469028 2E2.7E2.2393
L1 X 486178 2.7E2.11E2.41
38 802725 3.5E2.7.11.139
L1 X 863835 3.5.7.19.433
39 879712 2E5.37.743
L1 X 901424 2E4.53.1063
47 1185376 2E5.17.2179
L1 X 1286744 2E3.41.3923
49 1328470 2.5.11.13.929
L1 X 1483850 2.5E2.59.503
52 1466150 2.5E2.7.59.71
L1 X 1747930 2.5.47.3719
56 1798875 3E3.5E3.13.41
L1 X 1870245 3E2.5.13.23.139
66 3606850 2.5E2.31.13.179
L1 X 3892670 2.5.31.29.433
71 4259750 2.5E3.11.1549
L1 X 4445050 2.5E2.19.4679
72 4482765 3E2.5.19.7E2.107
L1 X 5120595 3E2.5.19.53.113
74 4604776 2E3.11E2.67.71
L1 X 5162744 2E3.113.5711
77 5232010 2.7.5.41.1823
L1 X 5799542 2.7E2.23.31.83
78 5357625 3.7.13.5E3.157
L1 X 5684679 3E2.7.13.11.631
80 5459176 2E3.17.137.293
L1 X 5495264 2E5.83.2069
88 7275532 2E2.11.37.41.109
L1 X 7471508 2E2.11E2.43.359
93 7800544 2E5.43.5669
L1 X 7916696 2E3.17.58211
94 7850512 2E4.37.89.149
L1 X 8052488 2E3.29.61.569
102 9206925 3.5E2.7.13.19.71
L1 X 10791795 3.5.7.79.1301
106 9491625 3E2.5E3.13.11.59
L1 X 10950615 3E2.5.13.18719
107 9660950 2.5E2.13.89.167
L1 X 10025290 2.5.11.91139
110 10533296 2E4.19.34649
L1 X 10949704 2E3.29.109.433
112 10596368 2E4.29.41.557
L1 X 11199112 2E3.53.61.433
113 10634085 3E4.7.11E2.5.31
L1 X 14084763 3.7.11E2.23.241
119 11693290 2.7.5.167047
L1 X 12361622 2.7E2.13.31.313
120 11905504 2E5.13.28619
L1 X 13337336 2E3.107.15581
123 13671735 3.5.19.7E2.11.89
L1 X 15877065 3.5.19.17.29.113
128 14443730 2.5.7E3.4211
L1 X 15882670 2.5.19.179.467
142 18655744 2E9.83.439
L1 X 19154336 2E5.619.967
148 22249552 2E4.13.41.2609
L1 X 25325528 2E3.587.5393
153 23628940 2E2.5.37E2.863
L1 X 27428276 2E2.17.251.1607
155 25596544 2E7.311.643
L1 X 25640096 2E5.67.11959
161 30830696 2E3.13.521.569
L1 X 31652704 2E5.449.2203
166 32685250 2.5E3.13.89.113
L1 X 34538270 2.5.13.379.701
179 38400512 2E9.179.419
L1 X 38938288 2E4.83.109.269
183 38807968 2E5.37.73.449
L1 X 40912232 2E3.37.89.1553
187 46237730 2.7.5.11E2.53.103
L1 X 61319902 2.7.83.113.467
188 46271745 3E2.5.13.19.23.181
L1 X 49125375 3E2.5E3.13.3359
190 46555250 2.5E3.7.37.719
L1 X 55880590 2.5.103.227.239
191 46991890 2.5.29.11.14731
L1 X 48471470 2.5.29.19E2.463
194 49215166 2.31.61.7.11.13E2
L1 X 55349570 2.31.61.5.2927
198 56512610 2.7.5.11.23.3191
L1 X 75866014 2.7E2.774143
199 56924192 2E5.13.193.709
L1 X 64562488 2E3.283.28517
201 59497888 2E5.41.101.449
L1 X 61953512 2E3.29.97.2753
205 66854710 2.5.17.13E3.179
L1 X 71946890 2.5.17.83.5099
215 74769345 3E3.5.7E2.89.127
L1 X 82824255 3E3.5.17.151.239
220 79324875 3E2.5E3.7E2.1439
L1 X 87133365 3E2.5.11.103.1709
228 88144630 2.5.7E2.29.6203
L1 X 102814490 2.5.37.269.1033
238 102719740 2E2.5.29E2.31.197
L1 X 129063812 2E2.43.431.1741
245 115259625 3E3.5E3.13.37.71
R9 X 123757335 3E3.5.13.151.467
246 115447424 2E7.59.15287
L1 X 118458976 2E5.349.10607
247 115749344 2E5.47.76961
L1 X 116983744 2E6.431.4241
```

```
  249 118458830 2.7.5.37.45737
L1 X  131819506 2.7E2.13.107.967
  250 120812175 3E3.5E2.11.53.307
R9 X  126671985 3E3.5.11.197.433
  251 121293315 3E3.5.13.11.61.103
R9 X  138690045 3E2.5.13.383.619
  252 127924335 3E2.5.7.11.36919
L1 X  148532625 3E2.5E3.31.4259
  253 131118975 3E2.5E2.13.23.1949
R9 X  132926625 3E2.5E3.13.61.149
  255 133089500 2E2.5E3.23.71.163
R9 X  176374564 2E2.383.115127
  256 133178325 3.5E2.7E3.31.167
L1 X  133471275 3.5E2.7.31.59.139
  259 134886465 3E4.5.7E3.971
L1 X  147382335 3E4.5.19.107.179
  261 136770075 3E2.5E2.13.19.23.107
R9 X  155711205 3E2.5.13.179.1487
  263 138605350 2.5E2.13E2.47.349
R9 X  147313850 2.5E2.23.128099
  269 146648612 2E2.19.11E2.37.431
R9 X  159017308 2E2.19.23.90971
  273 154190750 2.7E2.5E3.41.307
R9 X  190889986 2.7E2.43.97.467
  277 157151410 2.5.13E3.23.311
R9 X  163634510 2.5.13.89.14143
  283 166737550 2.5E2.7.359.1327
R9 X .188953970 2.5.23.829.991
  285 169000448 2E9.71.4649
L1 X  173499952 2E4.53.204599
  293 177997352 2E3.13.653.2621
L1 X  182108128 2E5.229.24851
  302 195857415 3E2.5.13.19.67.263
R9 X  196214265 3E3.5.13.23.4861
  304 199432948 2E2.11.13.151.2309
R9 X  213484172 2E2.11E2.197.2239
  305 200328232 2E3.13.157.12269
L1 X  206790368 2E5.6462199
  306 200879055 3E3.5.13.17.6733
L1 X  206393265 3E5.5.13.73.179
  308 203055622 2.7.19.11.29.2393
L1 X  210627578 2.7E2.19.31.41.89
  309 203972715 3E3.5.31.17.47.61
L1 X  207429525 3E3.5E2.31.23.431
  330 248658488 2E3.13E2.183919
W2 X  256201912 2E3.37.43.20129
  342 267217335 3E2.5.7E2.11.23.479
R9 X  347397705 3E2.5.89.127.683
  343 270039910 2.5.7.47.211.389
R9 X  301444250 2.5E3.79.15263
  356 286000065 3E5.5.13.19.953
R9 X  297390015 3E3.5.13.41.4133
  364 301685895 3E2.5.19E2.7E2.379
L1 X  342005985 3E2.5.19E2.37.569
  366 302770672 2E4.29.257.2539
L1 X  306676928 2E6.773.6199
  367 304443436 2E2.31.61.11.3659
L1 X  305517524 2E2.31.61.13E2.239
  372 311414355 3E3.5.7E2.179.263
R9 X  338659245 3E3.5.23.29.3761

  377 318580262 2.7E2.11.13.127.179
L1 X  343312858 2.7.17.23.59.1063
  378 319682650 2.5E2.7.59.113.137
L1 X  382593830 2.5.61.367.1709
  384 332448224 2E5.53.211.929
R9 X  338290096 2E4.53.269.1483
  386 334438875 3E4.5E3.17.29.67
R9 X  358687845 3E4.5.17.59.883
  389 346657311 3E2.7E2.13.11.23.239
R9 X  370393569 3E2.7.13.17.37.719
  395 359156770 2.7E2.5.83.8831
R9 X  402020318 2.7.17.37.71.643
  396 360027675 3E2.5E2.19.7.53.227
R9 X  433850085 3E2.5.19.557.911
  399 362645570 2.7E2.5.643.1151
R9 X  398531518 2.7.11.47.55061
  403 371840350 2.7.31.5E2.43.797
R9 X  464106146 2.7E2.31.152767
  412 394800070 2.7.5.41.151.911
R9 X  443597882 2.7E2.13.191.1823
  414 395939775 3.5E2.11.7.17.37.109
R9 X  499717185 3.5.11.61.131.379
  422 419640364 2E2.13.11.83.8839
R9 X  453610196 2E2.13E3.71.727
  425 426386025 3E5.5E2.13.5399
R9 X  426684375 3E3.5E5.13.389
  440 467406225 3E2.5E2.13.11.73.199
R9 X  534612975 3.5E2.13.19.28859
  449 506468950 2.5E2.13.37.21059
L1 X  535495610 2.5.13.269.15313
  455 522145832 2E3.13.173.29021
L1 X  538318048 2E5.2029.8291
  462 540759375 3E3.5E5.13.17.29
R9 X  640415025 3E3.5E2.269.3527
  465 551388915 3E2.5.7E2.11.127.179
R9 X  677841165 3E2.5.23.569.1151
  472 577884195 3E2.5.7E2.262079
L1 X  587323485 3E2.5.7.1091.1709
  473 579926204 2E2.13E2.11.167.467
R9 X  628681924 2E2.13.103.107.1097
  482 601235145 3E2.5.19.7E2.113.127
R9 X  696285495 3E2.5.19.47.17327
  488 626323995 3E7.5.41.11.127
R9 X  643272165 3E3.5.41.23.31.163
  489 630007455 3.5.7E2.11.29.2687
R9 X  693778785 3.5.7.23.287279
  491 640001054 2.7E2.19.11.31247
R9 X  642416866 2.7.19.13.37.5021
  497 658009485 3E2.5.7E3.89.479
R9 X  689830515 3E2.5.11.47.149.199
  508 683490885 3.5.7.11E2.23.2339
R9 X  750610875 3.5E3.7.269.1063
  510 688679775 3E2.5E2.7.17E3.89
R9 X  825955425 3E2.5E2.71.149.347
  516 705023055 3E3.5.11.43.61.181
R9 X  724885425 3E2.5E2.11.109.2687
  518 721522755 3E3.5.17.29.37.293
R9 X  726368445 3E3.5.11E2.53.839
  522 751953405 3.5.7.19.37.61.167
R9 X  767949315 3.5.7E2.19.127.433

  529  769289955 3.5.7E2.19.31.1777
L1 X   787384605 3.5.7.19.37.10667
  535  807848864 2E5.61.163.2539
L1 X   819234496 2E6.1301.9839
  538  821921625 3E2.5E3.7.29.59.61
R9 X   988676775 3E2.5E2.71.199.311
  541  845397735 3.5.7E2.13.103.859
R9 X   867557145 3.5.7.13.569.1117
  549  869530725 3E2.5E2.7E3.19.593
R9 X  1045525275 3E2.5E2.89.109.479
  560  912404025 3E2.5E2.13.17.59.311
R9 X   988724295 3E2.5.13.61.103.269
  566  932913124 2E2.11.13E2.109.1151
R9 X  1015026716 2E2.11.191.120779
  576  967887488 2E7.61.113.1097
R9 X  1011081832 2E3.61.37.55997
  577  967947856 2E4.19E2.103.1627
R9 X  1031796176 2E4.3847.16763
  578  968410624 2E9.61.101.307
R9 X  1024180592 2E4.241.265607
  581  978888550 2.5E2.31.43.19.773
R9 X  1048124570 2.5.31.43.61.1289
  582  989779882 2.7.19.13.17.113.149
R9 X  1078636118 2.7E2.19.41.71.199
  584  992776995 3E2.5.7E2.450239
L1 X  1008990045 3E2.5.7.797.4019
  585  994945490 2.7E2.5.11E2.97.173
R9 X  1331936326 2.7E2.881.15427
  589 1002455350 2.5E2.13.1542239
L1 X  1005541130 2.5.11.59.154937
  590 1015866225 3E3.5E2.11.41.47.71
R9 X  1143995535 3E3.5.17.503.991
  595 1033407104 2E7.83.211.461
R9 X  1064553376 2E5.1019.32647
  598 1047381370 2.5.7E3.47.73.89
R9 X  1254314630 2.5.59.443.4799
  602 1056277222 2.7E2.19.11.13.3967
R9 X  1223576858 2.7.19.41.151.743
  606 1077722984 2E3.13.1913.5417
L1 X  1099987936 2E5.179.192037
  607 1082038815 3E2.5.13.11.181.929
R9 X  1135944225 3E2.5E2.13.83.4679
  609 1086321110 2.5.7.37.419429
R9 X  1208799850 2.5E2.71.163.2089
  620 1127508130 2.5.7E2.31.199.373
R9 X  1328325470 2.5.43.271.11399
  621 1129315275 3E2.5E2.31.11.41.359
R9 X  1210534965 3E2.5.31.23.29.1301
  622 1131258975 3.5E2.31.7.11.71.89
R9 X  1337154465 3.5.31.17.47.59.61
  623 1133458150 2.5E2.11.347.5939
L1 X  1173447770 2.5.11.929.11483
  627 1179749410 2.5.7.151.239.467
R9 X  1278710750 2.5E3.37.138239
  628 1183083825 3.5E2.7.11.349.587
R9 X  1266759375 3.5E5.7.97.199
  631 1195637144 2E3.13E2.383.2309
L1 X  1239287656 2E3.23.239.28181
  637 1216935225 3E3.5E2.31.11.17.311
R9 X  1457179335 3E3.5.31.348191

  647 1251532282 2.7.11E2.13.17.3343
R9 X  1438327814 2.7.11.9339791
  650 1264688650 2.5E2.17.53.67.419
R9 X  1317021110 2.5.17.61.89.1427
  651 1272724250 2.7.5E3.727271
L1 X  1450182118 2.7.11.251.37517
  656 1284072075 3E3.5E2.11.13.53.251
R9 X  1550746485 3E3.5.41.503.557
  657 1289325975 3.5E2.7E2.41.43.199
R9 X  1323006825 3.5E2.7.29.113.769
  659 1303670522 2.7.11.19.41.10867
R9 X  1325516038 2.7.11E2.19.41183
  664 1323789350 2.5E2.13.67.113.269
R9 X  1401348730 2.5.29.37.61.2141
  669 1348200032 2E5.59.461.1549
L1 X  1358657968 2E4.53.109.14699
  670 1357689830 2.5.7.107.109.1663
R9 X  1488948250 2.5E3.47.126719
  676 1400735930 2.5.11E2.31.107.349
R9 X  1495046470 2.5.17.139.151.419
  682 1458334432 2E5.53.73.11779
R9 X  1507257008 2E4.89.251.4217
  687 1517112765 3E2.5.7E2.47.14639
R9 X  1607180355 3E2.5.11.59.113.487
  701 1585667930 2.7E2.5.11.37.7951
R9 X  2134722982 2.7.83.227.8093
  703 1601150265 3E2.5.13.11.61.4079
R9 X  1713637575 3E2.5E2.13.509.1151
  705 1618057875 3.5E3.17.7.101.359
R9 X  1681454445 3.5.17.11.23.67.389
  709 1666776566 2.7.31.13.29.61.167
R9 X  1693008394 2.7.31.11.67E2.79
  714 1721688850 2.7.31.5E2.107.1483
R9 X  2094066926 2.7.31.61.83.953
  715 1723336461 3E2.7.11.17.19.7699
R9 X  1736119539 3E2.7E3.11.29.41.43
  719 1754082603 3E2.7.13E3.19.23.29
R9 X  1810205397 3E2.7.13.11.67.2999
  724 1774259235 3E4.5.7.19.32939
L1 X  2052051165 3E9.5.29.719
  725 1775992725 3E2.5E2.13.23.26399
R9 X  1798778475 3E3.5E2.13.359.571
  726 1783852785 3E2.5.13.11E3.29.79
R9 X  2052998415 3E2.5.13.1151.3049
  734 1814936354 2.7.19.11E2.17.31.107
R9 X  2156422366 2.7.19.71.227.503
  738 1861960700 2E2.5E2.17.593.1847
R9 X  2425702372 2E2.131.433.10691
  745 1895700345 3.7.11E2.17.5.67.131
R9 X  2230100103 3.7E2.11.17.31.2617
  748 1929310100 2E2.5E2.83.191.1217
R9 X  2333417068 2E2.23.4463.5683
  749 1930301618 2.7.19.17.37.83.139
R9 X  1930741582 2.7.19.11E2.223.269
  754 1964397015 3E4.5.7E3.79.179
R9 X  2217362985 3E3.5.19.131.6599
  758 1983736876 2E2.11.19E2.71.1759
R9 X  2071810004 2E2.11.43.719.1523
  765 2026348300 2E2.271.5E2.23.3251
R9 X  2580356852 2E2.271.61.39023
```

```
 769 2043906130 2.5.7E3.179.3329
R9 X 2271773870 2.5.29.73.239.449
 775 2083894785 3E2.5.7E3.79.1709
R9 X 2184265215 3E2.5.11.37.239.499
 794 2201899310 2.5.31.13E3.53.61
R9 X 2387806930 2.5.31.29.265607
 798 2223111345 3.5.7.13E3.23.419
R9 X 2383045455 3.5.7.19.251.4759
 818 2379890150 2.5E2.31.11.97.1439
R9 X 2659787290 2.5.31.83.167.619
 819 2402498475 3E5.5E2.13.29.1049
R9 X 2573745525 3E2.5E2.13.587.1499
 820 2402562825 3E2.5E2.13.17.19.2543
L1 X 2764606455 3E2.5.13.929.5087
 825 2421696130 2.7E2.5.31.131.1217
R9 X 2856901502 2.7.13.1367.11483
 828 2440775024 2E4.29.83.63377
L1 X 2510314336 2E5.557.140839
 829 2440883588 2E2.11.13.83.51413
R9 X 2637996988 2E2.11E2.1721.3167
 832 2448784550 2.5E2.31.17.199.467
R9 X 2565180250 2.5E3.31.89.3719
 834 2481907330 2.5.7E2.263.19259
L1 X 2734933310 2.5.17.1319.12197
 838 2502894550 2.5E2.43.13.149.601
R9 X 2670211850 2.5E2.43.79E2.199
 846 2611143964 2E2.11.13E2.251.1399
R9 X 2812097636 2E2.17.29.167.8539
 847 2612831949 3E2.7E2.13.19.17E2.83
L1 X 2737662291 3E2.7E2.13.19.41.613
 849 2624170185 3E2.7.13.5.53.107.113
R9 X 3183941943 3E2.7E2.13.127.4373
 853 2671748950 2.5E2.31.13.67.1979
R3 X 2937892010 2.5.31.43.433.509
 857 2702347270 2.7.5.1607.24023
R9 X 2860457978 2.7.17.29E2.31.461
 873 2828720510 2.7E2.5.11.83.6323
R9 X 3711610882 2.7.53.113.44267
 874 2840437756 2E2.19.13E2.37.43.139
R9 X 3156691844 2E2.19.41.151.6709
 883 2896764608 2E6.53.853999
L1 X 2959967392 2E5.199.464819
 893 2960375535 3E2.5.13E2.31.29.433
R9 X 2986743825 3E2.5E2.13.31.32939
 897 2995750730 2.5.7E2.1223.4999
R9 X 3283369270 2.5.29.37.305999
 900 3000833115 3.5.7.17.19.23.3847
R9 X 3382537125 3.5E3.11.47.73.239
 908 3054330279 3E2.7E3.13.11E2.17.37
R9 X 3568431321 3E3.7E2.13.207479
 911 3101299916 2E2.11.13.113.47981
R9 X 3331358932 2E2.11E2.263.26171
 912 3105174904 2E3.13E2.2296727
R9 X 3199343456 2E5.1097.91139
 916 3135932032 2E7.101.107.2267
R9 X 3235061408 2E5.3671.27539
 917 3138655065 3.5.7E2.13.29.47.241
R9 X 3535433895 3.5.7.41.131.6269
 918 3143417344 2E9.89.101.683
R9 X 3280122416 2E4.113.659.2753

 923 3232160384 2E7.173.227.643
R9 X 3282775456 2E5.229.347.1291
 924 3254018625 3E2.5E3.13.11.113.179
R9 X 3737227455 3E2.5.13.479.13337
 925 3260154664 2E3.13E3.251.739
R9 X 3397181336 2E3.29.97.150959
 934 3359556915 3.5.11.17.13E2.19.373
R9 X 3736509645 3.5.11E3.17.101.109
 940 3396934125 3E3.5E3.13.139.557
R9 X 3427629075 3E3.5E2.13.167.2339
 950 3437107245 3E2.5.13.11E2.59.823
R9 X 3743360595 3E3.5.13.617.3457
 955 3445207395 3.5.7E2.19.29.47.181
R9 X 3725301405 3.5.7.19.1867319
 957 3459581824 2E7.97.278639
R9 X 3503631776 2E5.139.773.1019
 959 3475340505 3E3.5.7.13E2.47.463
R9 X 4350149415 3E3.5.127.487.521
 963 3554097885 3E3.5.13E3.23.521
R9 X 3601895715 3E3.5.11.41.59159
 964 3554318372 2E2.11E3.19.41.857
R9 X 3831620188 2E2.11.103.845459
 968 3602732595 3.5.19.7E2.11.47.499
R9 X 4276947405 3.5.19.23.29.149.151
 971 3647464821 3E2.7.13.11.23.29.607
R9 X 4001077899 3E2.7E2.13.31.47.479
 978 3685361368 2E3.13E2.47.59.983
R9 X 4093749032 2E3.79.2213.2927
 988 3797392550 2.5E2.7.107.101399
L1 X 4350300250 2.5E3.3719.4679
 991 3833109376 2E7.71.197.2141
R9 X 3953660384 2E5.2753.44879
 993 3848313645 3E4.5.11E5.59
R9 X 3868601715 3E4.5.11E2.89.887
1000 3905322225 3.5E2.7.19.53.83.89
R9 X 4194159375 3.5E5.7.79.809
1003 3949406848 2E7.211.349.419
R9 X 3997413152 2E5.139.499.1801
1004 3956965155 3E3.5.11.13E2.15767
R9 X 4353401565 3E3.5.17.71.26717
1005 3961085625 3E3.5E4.7.33533
R9 X 4419731655 3E3.5.17.137.14057
1007 3971606470 2.5.13E2.17.138239
R9 X 4224919610 2.5.19.71.107.2927
1010 4000783984 2E4.43.113.51461
L1 X 4001351168 2E9.1367.5717
1014 4029072075 3E2.5E2.7.19.134639
R9 X 4652515125 3E3.5E3.109.12647
1017 4049815250 2.5E3.13.43.28979
L1 X 4304770990 2.5.13.857.38639
1020 4063895408 2E4.19E2.449.1567
R9 X 4269946192 2E4.179.839.1777
1025 4109466950 2.5E2.31.17.83.1879
R9 X 4349991610 2.5.31.23.433.1409
1027 4141715570 2.5.19.23E2.89.463
R9 X 4171865230 2.5.13.47.157.4349
1032 4152981844 2E2.11E2.23.53.7039
R9 X 4341313196 2E2.11.43.797.2879
1038 4242143750 2.5E5.13.109.479
R9 X 4419801850 2.5E2.19.1567.2969

1046 4321518201 3E2.7E2.13.11.17.29.139
R9 X 5089774599 3E2.7E3.13.53.2393
1051 4377238047 3E2.7.13.17.29.37.293
R9 X 4406635233 3E2.7.13.11E2.53.839
1053 4396203070 2.5.7E2.107.191.439
R9 X 4964856770 2.5.31.131.179.683
1066 4589689390 2.5.11.13.167.19219
R9 X 5174685650 2.5E2.79.881.1487
1069 4617085725 3E3.5E2.7.53.103.179
R9 X 5410843875 3E3.5E3.479.3347
1070 4634941234 2.7.11.17.37.59.811
R9 X 4962509006 2.7E2.13.47.179.463
1073 4702051046 2.7.23.11E2.17.31.229
R9 X 5446976794 2.7.23.29.151.3863
1074 4709813710 2.5.7.1307.51479
R9 X 4986547250 2.5E3.47.59.7193
1077 4763730208 2E5.17.1949.4493
L1 X 5173851992 2E3.41.15773939
1080 4785332175 3E5.5E2.13E2.59.79
R9 X 5126533425 3E2.5E2.13.479.3659
1083 4802570325 3E3.5E2.7.293.3469
L1 X 5317615275 3.5E2.7.139.72869
1084 4839564015 3E2.5.13.11.61.12329
R9 X 5177919825 3E2.5E2.13.359.4931
1085 4842186615 3E3.5.7E2.359.2039
R9 X 5204405385 3E3.5.23.37.89.509
1094 4931246565 3E2.5.7E2.29.67.1151
R9 X 5517209115 3E2.5.11.683.16319
1097 4960585125 3E3.5E3.31.17.2789
R9 X 5067344475 3E3.5E2.31.23.10529
1100 4999722525 3E2.5E2.7.17.29.47.137
R9 X 6532396515 3E2.5.59.863.2851
1102 5032905345 3E2.5.13E2.61.19.571
L1 X 5091357375 3E2.5E3.13E2.61.439
1103 5047072690 2.5.11.37.743.1669
R9 X 5151203150 2.5E2.17.191.31729
1105 5060442170 2.5.7E2.31.79.4217
R9 X 6018387910 2.5.73.113.72959
1108 5088398630 2.5.7E2.1319.7873
R9 X 5575517050 2.5E2.37.1187.2539
1110 5118127490 2.7.5.37.167.11833
R9 X 5760821374 2.7.11E2.487.6983
1114 5164511625 3E2.7.13.5E3.61.827
R9 X 6495742071 3E2.7.13.103.77003
1120 5228978728 2E3.17E2.53.139.307
R9 X 5493671672 2E3.41.89.307.613
1123 5296175750 2.5E3.17.29.97.443
R9 X 5700176890 2.5.19.83.181.1997
1124 5301374925 3.5E2.11.7E2.199.659
R9 X 5894337075 3.5E2.11.23.113.2749
1133 5442123375 3E3.5E3.13.71.1747
R9 X 5552656785 3E3.5.13.37.233.367
1135 5444435745 3E2.5.7.61.67.4229
R9 X 5683780575 3E2.5E2.11.563.4079
1138 5455059448 2E3.127.19E2.107.139
R9 X 5605522952 2E3.127.41.53.2539
1139 5477707264 2E9.59.149.1217
R9 X 5736418736 2E4.131.1049.2609
1148 5575354850 2.5E2.13.17.83.6079
R9 X 6393879070 2.5.41.139.151.743

1155 5640198165 3E2.5.19.7E2.61.2207
R9 X 6532594155 3E2.5.19.47.162563
1157 5676646514 2.7.11E2.23.53.2749
R9 X 5699641486 2.7E2.11.41.43.2999
1161 5745724875 3E4.11.5E3.23.2243
R9 X 6453305397 3E4.11.7.67.15443
1162 5747841099 3E2.7.13.11E2.31.1871
R9 X 5852448693 3E5.7.13.23.37.311
1168 5815260550 2.11.31.5E2.17.20063
R9 X 7082199674 2.11.31.37.43.61.107
1169 5845926555 3E2.5.19.7.37.26399
R9 X 6674009445 3E3.5.19.439.5927
1171 5857529678 2.7E3.13.11.29E2.71
R9 X 6785209522 2.7.13.239.389.401
1172 5864752630 2.5.11E2.53.109.839
R9 X 6080349770 2.5.11.2393.23099
1175 5906679975 3E5.5E2.7.138899
R9 X 6632100825 3.5E2.7.2777.4549
1177 5907709665 3E2.5.13.11.79.11621
R9 X 6275865375 3E2.5E3.13.429119
1179 5935418265 3.5.7E2.19.47.9043
R9 X 5941886055 3.5.7.19.37.101.797
1182 5945041304 2E3.17.37E3.863
R9 X 6199515496 2E3.23.821.41039
1186 6001753725 3E5.5E2.11.19.29.163
R9 X 7322393475 3E2.5E2.79.491.839
1195 6104279475 3E4.5E2.7.499.863
R9 X 6859176525 3E3.5E2.53.109.1759
1196 6107550855 3.5.7E2.19.41.10667
R9 X 6151261305 3.5.7E2.19E2.97.239
1201 6155750475 3E2.5E2.7.23.109.1559
R9 X 7121971125 3E2.5E3.59.61.1759
1209 6261264590 2.5.7E2.149.191.449
R9 X 7035695410 2.5.37.53.499.719
1221 6397019750 2.5E3.11.19.191.641
R9 X 7447992730 2.5.31.3209.7487
1227 6559115488 2E5.53.281.13763
R9 X 6645570608 2E4.41.971.10433
1229 6575884876 2E2.19.41.11E2.107.163
R9 X 7275607604 2E2.19.41.113.20663
1231 6677930385 3E5.7.5.37.21221
R9 X 7412119407 3E5.7E2.11.56591
1237 6741318350 2.5E2.13.89.116531
L1 X 6913901410 2.5.13.53.1003469
1246 6794712832 2E8.89.298223
R9 X 6920608928 2E5.227.653.1459
1248 6862936275 3E3.5E2.13.29.149.181
R9 X 7354903725 3E2.5E2.13.503.4999
1250 6891050528 2E5.29.2053.3617
R9 X 7154242552 2E3.23E2.971.1741
1251 6898979516 2E2.11.13E2.269.3449
R9 X 7420038484 2E2.17.29.149.25253
1254 6943893957 3E2.7.13.19.11.113.359
R9 X 7397123643 3E2.7E2.13.19.59.1151
1265 7143425289 3E3.7.13.11.113.2339
R9 X 7197592311 3E3.7E2.13.17.103.239
1266 7148883170 2.5.11.13.89.56171
R9 X 8138888350 2.5E2.179.251.3623
1269 7274734155 3E2.5.13.19.53E2.233
R9 X 7356799125 3E2.5E3.13.41.12269
```

```
1273 7319982604 2E2.11E2.17.389.2287
R9 X 7633515956 2E2.11.41.659.6421
1275 7336299285 3E2.5.7.19.443.2767
R9 X 8001520875 3E3.5E3.47.73.691
1277 7347995392 2E8.269.106703
L1 X 7373955488 2E5.71.3245579
1281 7430796945 3E2.5.13.11E2.113.929
R9 X 7967123775 3E2.5E2.13.569.4787
1284 7482410325 3E2.5E2.13.31.179.461
R9 X 7531628715 3E2.5.13.31.29.14321
1287 7523483030 2.5.7E2.53.271.1069
R9 X 8601297130 2.5.37.71.327419
1288 7534469228 2E2.19.11.13.761.911
R9 X 8810613652 2E2.19E2.227.26879
1289 7562801950 2.5E2.11.2099.6551
L1 X 7792465250 2.5E3.19.1640519
1291 7579753125 3.5E5.7.19.6079
R9 X 7619274075 3.5E2.7.19.419.1823
1293 7592910975 3E3.5E2.13.43.20123
R9 X 7778605185 3E2.5.13.43.29.10663
1305 7780806075 3.5E2.7.17.149.5851
R9 X 7893190725 3.5E2.7E2.43.199.251
1309 7822669778 2.7E2.11.19.167.2287
R9 X 7952449582 2.7.11.19.131.20747
1311 7900303190 2.5.31.13.619.3167
R9 X 7938683050 2.5E2.31.47.59.1847
1318 8006813199 3E3.7E2.19.11.23.1259
R9 X 8540514801 3E3.7.19.13.113.1619
1320 8052147896 2E3.13.509.152111
R9 X 8239047304 2E3.23.97E2.4759
1323 8119394450 2.5E2.31.19.23.11987
R9 X 9005223790 2.5.31.73.107.3719
1333 8269106625 3E2.13E2.31.61.5E3.23
L1 X 9402333759 3E2.13E2.31.61.7.467
1335 8279312030 2.5.11.37.881.2309
R9 X 8443831330 2.5.11E2.1187.5879
1337 8293896650 2.5E2.13.89.307.467
R9 X 8596897270 2.5.13.131.181.2789
1342 8376676490 2.7.5.13.19E2.43.593
R9 X 11698280566 2.7.967.864107
1344 8455838230 2.7.5.97.911.1367
R9 X 9150518762 2.7.11E2.83.151.431
1345 8459517832 2E3.17E3.31.53.131
R9 X 9400398968 2E3.79.2087.7127
1346 8467262505 3E4.5.13E2.17.19.383
R9 X 9899027415 3E4.5.31.487.1619
1348 8491739828 2E2.13.11E2.103.13103
R9 X 9271203916 2E2.13.83.227.9463
1349 8502526305 3E2.7E2.13.5.47.6311
R9 X 10355911839 3E2.7.13.53.227.1051
1355 8557778500 2E2.5E3.197.283.307
R9 X 10355067452 2E2.23.9371.12011
1361 8676652328 2E3.19E2.47.97.659
R9 X 9066365272 2E3.43.59.587.761
1362 8717951385 3E2.5.13.11E2.79.1559
R9 X 9407501415 3E2.5.13.37.223.1949
1366 8850661358 2.7E2.19.11.601.719
R9 X 8937716242 2.7.19.13.89.113.257
1367 8851379072 2E7.29.433.5507
R9 X 9435731728 2E4.3467.170099
1370 8924047490 2.5.17.19.521.5303
R9 X 9017050750 2.5E3.17.271.7829
1371 8935581375 3E2.5E3.7.53.79.271
R9 X 10128267585 3E2.5.19.47.103.2447
1374 8971549180 2E2.5.11.2963.13763
R9 X 11589884804 2E2.151.211E2.431
1380 9018517725 3E4.5E2.7.349.1823
R9 X 10138589475 3.5E2.7.19311599
1384 9075291470 2.7E2.5.23.43.61.307
R9 X 11614384306 2.7.41.113.241.743
1390 9153086085 3E2.5.13.11.37E2.1039
R9 X 10021735035 3E2.5.13.47.389.937
1391 9159365024 2E5.53.241.22409
L1 X 9290429416 2E3.17.4157.16433
1394 9205801010 2.5.7E3.109.24623
R9 X 10296406990 2.5.37.53.191.2749
1398 9262239250 2.5E3.11.1783.1889
R9 X 9673564910 2.5.17.47.181.6689
1399 9271316500 2E2.5E3.53.271.1291
R9 X 11451453932 2E2.47.101.683.883
1405 9357224877 3E2.7E3.13.11E2.41.47
R9 X 10162493523 3E5.7E3.13.83.113
1409 9490622048 2E5.61.4861999
L1 X 9500349952 2E9.4079.4549
1411 9549021568 2E7.37.101.19963
R9 X 10182996752 2E4.9043.70379
1417 9818506568 2E3.13E2.29.179.1399
R9 X 10933693432 2E3.89.1049.14639
1420 9844469775 3E2.5E2.7.23.29.9371
R9 X 11910566385 3E2.5.19.991.14057
1423 9880655085 3E2.5.7.17.233.7919
R9 X 10935385875 3E2.5E3.19.431.1187

TOTAL NUMBER:  345
```

Appendix III

The gcd's of the first 1427 APs

GCD	FREQ	RANK NUMBER(S) OF AP'S WITH THIS GCD									
2	2										
		2	278								
4	67										
		1	3	4	23	24	36	53	64	83	97
		115	153	154	165	209	226	238	255	267	274
		294	313	323	345	347	348	502	505	570	586
		632	645	721	738	748	750	763	776	800	807
		811	822	842	846	852	867	877	909	920	937
		975	976	1060	1119	1132	1160	1251	1307	1316	1322
		1350	1355	1365	1368	1374	1399	1406			
8	208										
		5	6	17	21	26	31	32	33	34	35
		37	40	42	47	59	62	65	67	69	74
		76	80	81	84	90	93	94	95	103	110
		112	116	120	122	126	131	140	143	144	148
		150	159	161	163	174	180	182	184	186	192
		199	201	206	208	212	217	218	239	240	244
		258	266	279	280	293	296	298	300	305	311
		314	315	317	318	330	333	339	353	357	361
		363	374	375	376	382	387	400	405	417	432
		438	447	452	455	458	459	463	467	475	498
		513	523	525	546	552	553	558	571	574	579
		580	587	591	599	606	631	633	639	644	646
		652	658	665	668	690	702	713	716	720	722
		727	737	762	771	788	806	808	814	836	845
		848	854	855	858	863	869	871	876	881	912
		913	919	925	942	946	953	972	973	974	978
		981	982	992	999	1011	1026	1028	1043	1063	1077
		1078	1079	1113	1117	1120	1126	1130	1141	1152	1153
		1164	1170	1182	1184	1213	1218	1222	1235	1243	1250
		1252	1253	1279	1302	1320	1329	1345	1354	1356	1361
		1376	1378	1391	1393	1404	1407	1408	1417		
10	94										
		13	18	43	45	49	52	54	55	58	70
		75	79	98	99	105	107	128	146	190	210
		219	227	228	264	275	283	286	289	299	328
		332	343	378	420	437	441	448	476	479	507
		519	534	544	589	598	609	617	620	627	664
		670	674	676	723	759	769	826	834	835	843
		859	897	904	1001	1007	1023	1027	1042	1053	1062
		1064	1066	1074	1093	1103	1104	1105	1108	1111	1123
		1148	1159	1167	1209	1221	1240	1257	1266	1285	1287
		1373	1394	1398	1419						
14	30										
		25	61	73	77	119	127	135	177	187	198
		249	377	395	399	412	470	480	651	701	756
		790	809	825	857	873	1070	1110	1342	1344	1384
15	1										
		900									

16 150
8 10 16 19 20 27 29 39 51 60
63 68 86 118 121 156 158 164 169 175
179 185 193 196 213 231 232 248 257 281
284 285 288 307 320 322 326 327 336 351
365 366 381 385 390 397 407 429 433 434
435 445 450 453 454 474 486 487 509 514
527 536 545 550 573 575 577 578 583 625
643 654 669 671 672 673 682 692 696 699
706 735 742 744 778 799 828 850 866 887
894 903 906 918 930 945 951 958 962 966
970 1006 1010 1016 1020 1021 1035 1036 1041 1059
1075 1086 1095 1106 1115 1116 1125 1127 1128 1129
1139 1146 1154 1180 1187 1192 1194 1198 1202 1211
1214 1227 1238 1241 1244 1256 1261 1268 1274 1292
1297 1326 1328 1336 1364 1367 1411 1415 1416 1424

21 1
316

22 3
89 567 1403

32 76
57 130 139 142 155 216 229 246 247 268
287 324 335 344 346 352 371 380 411 413
419 439 456 457 468 471 477 535 540 568
595 616 655 686 694 710 757 761 827 856
860 870 883 916 923 948 956 957 960 979
991 1003 1058 1067 1072 1118 1122 1163 1166 1178
1210 1223 1242 1246 1277 1308 1310 1341 1343 1360
1382 1383 1388 1395 1396 1409

44 37
22 88 211 262 304 388 398 428 566 572
596 603 608 624 662 697 752 758 770 823
829 868 892 911 914 915 932 964 989 990
1032 1092 1101 1273 1303 1321 1330

45 26
14 108 132 141 214 220 252 265 301 331
342 465 497 618 687 775 777 885 1094 1100
1135 1258 1275 1371 1420 1423

50 43
44 71 91 124 129 181 223 263 272 358
404 423 451 500 512 551 739 751 773 797
821 837 864 880 901 947 967 985 988 1008
1038 1096 1107 1131 1190 1204 1207 1208 1230 1289
1295 1340 1400

52 13
133 195 271 422 473 499 504 562 634 997
1319 1348 1357

63 2
746 931

64 22
92 197 464 526 594 611 638 641 801 886
891 902 907 1015 1076 1156 1245 1283 1286 1315
1331 1413

68 3
362 402 485

76 11
207 269 543 565 569 816 874 1071 1255 1272
1288

92 4
9 200 515 612

98 6
28 273 585 711 1089 1165

105 24
7 38 102 136 282 295 310 489 490 508
555 601 679 683 693 733 779 798 917 969
1022 1040 1203 1379

110 20
109 292 349 350 483 494 623 661 802 922
995 1112 1172 1181 1215 1226 1247 1260 1335 1425

124 2
442 983

128 2
104 718

130 16
87 166 277 449 466 592 691 736 784 865
1017 1150 1237 1337 1401 1402

135 47
11 41 82 145 152 171 189 215 221 224
225 319 354 372 391 409 418 481 484 493
518 539 590 604 613 656 666 675 728 754
772 795 921 959 963 1004 1005 1034 1037 1085
1174 1176 1185 1189 1347 1363 1372

136 5
996 1212 1233 1294 1298

148 2
444 987

152 16
125 360 436 559 600 805 812 831 879 895
1002 1091 1300 1324 1412 1426

154 16
168 394 421 610 626 630 647 649 653 804
872 898 986 1082 1157 1359

165 2
96 414

170 13
205 340 393 426 511 650 732 783 844 1216
1262 1264 1370

182 4
160 172 338 1171

184 6
431 704 774 781 943 1136

190 10
680 740 861 938 1012 1068 1098 1151 1276 1280

212 2
548 619

225 10
85 157 167 510 538 549 1014 1186 1188 1201

230 1
905

231 1
1144

232 3
101 537 1044

236	1	1301
238	2	234 1414
248	4	276 392 753 1421
250	1	588
255	1	705
256	4	520 556 792 1052
266	8	308 368 491 582 602 734 749 1366
273	1	78
285	2	123 968
286	1	764
290	2	191 1422
296	3	151 183 1220
310	11	66 204 730 794 818 839 853 1025 1099 1311 1323
315	13	162 236 254 472 584 700 813 817 833 1140 1145 1197 1351
322	1	1073
328	1	936
376	1	557
405	5	259 379 663 724 1346
424	2	747 1234
434	5	403 496 709 714 1024
465	1	622
484	2	712 884
488	2	576 890
495	4	516 533 593 1410
512	1	1259
518	1	517
525	17	410 521 628 657 688 789 878 939 1000 1083 1158 1173 1175 1225 1305 1380 1385
530	1	1386
548	1	1304
574	1	1047
585	41	15 30 48 56 106 114 137 138 173 178 188 203 251 261 290 302 334 560 607 667 703 707 726 820 824 862 924 927 950 984 1061 1084 1147 1177 1206 1269 1281 1325 1362 1375 1390
592	1	478
632	1	1018
664	1	564
670	1	243
675	15	147 202 462 506 554 614 642 684 841 889 1013 1069 1195 1217 1389
682	1	1168
688	3	369 1031 1081
692	1	944
693	5	176 321 424 715 1239
735	4	235 355 415 1029
752	1	965
765	3	1143 1200 1317
776	1	1314
790	1	677
808	1	977
819	19	12 170 222 389 698 719 767 780 786 849 949 971 998 1045 1051 1114 1162 1349 1381
825	2	1050 1124
848	2	384 1306
850	1	635
855	7	50 72 329 396 482 1155 1169
884	1	291
891	3	416 935 1161

908	1	980
950	3	563 1142 1267
975	1	440
1016	2	875 1138
1028	1	1427
1035	1	954
1048	1	446
1072	1	233
1078	2	370 636
1084	1	765
1150	3	230 648 731
1155	3	528 729 1397
1210	1	1149
1215	1	1054
1276	1	1065
1365	3	541 840 1137
1395	3	100 547 621
1425	2	469 1392
1485	5	149 250 337 373 1087
1550	13	111 241 383 406 427 461 561 597 681 832 929 1055 1339
1701	1	1231
1755	8	245 306 356 443 542 782 1133 1278
1862	2	134 1249
1911	1	685
1972	1	1377
1995	4	522 529 955 1179
2025	1	401
2079	2	926 952
2096	1	341
2132	1	605
2150	1	838
2152	1	1338
2295	2	615 882
2415	2	408 492
2457	1	1265
2528	1	1183
2541	1	113
2565	3	430 660 1019
2625	2	1282 1369
2805	1	934
2812	1	1313
2925	9	253 725 803 819 933 941 1049 1080 1248
2926	2	659 1309
3032	1	793
3105	2	325 851
3116	1	1229
3375	3	815 1205 1352
3591	1	1318
3645	1	1353
3782	1	194
3915	1	359
3927	1	745
3969	1	237
4185	2	309 637
4324	1	1332
4455	5	117 242 830 961 1193
4796	1	1090
5265	2	1199 1270

5296	1	503									
5535	2	488	766								
5733	10	46	270	312	501	532	908	928	1039	1046	1109
6237	1	1290									
6622	1	1121									
6885	3	386	791	1327							
6975	1	1088									
7030	1	1271									
7564	1	367									
7605	1	524									
8775	2	425	940								
9009	3	260	695	743							
9290	1	1009									
9405	1	1418									
9975	2	1057	1291								
11115	2	297	495								
11475	1	689									
13041	1	785									
13330	1	581									
13923	1	1232									
13965	2	1196	1387								
14355	1	994									
14445	1	741									
14535	1	1224									
14553	1	768									
15561	2	1254	1312								
15795	1	1358									
16245	1	364									
16275	1	256									
18135	2	893	1284								
18837	1	678									
20925	6	717	760	810	1097	1228	1263				
21068	1	910									
21879	1	1048									
23895	1	1296									
25155	1	1293									
30303	1	787									
31635	1	303									
33579	1	530									
34749	1	531									
38025	1	1236									
38493	1	1299									
40131	1	1405									
42826	1	1219									
43875	1	888									
44732	1	1033									
48735	1	896									
49005	3	708	755	993							
52725	1	899									
63063	1	629									
68607	1	796									
90675	1	1191									
108927	4	847	1056	1134	1334						
180873	1	640									
463905	1	1102									
539055	1	1030									
556101	1	460									
2876211	1	1333									