



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $0.551\overline{35}$

2) $0.304\overline{1}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $35.1\overline{39}$

4) $5.7\overline{4}$

5) $8.151\overline{51}$

6) $5.545\overline{9}$

7) $6.41\overline{32}$

8) $3.28\overline{9}$

9) $0.5\overline{31}$

10) $0.83\overline{1}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $0.551\overline{35}$

$$f = 0.551\overline{35}$$

$$100,000f = 55135.\overline{35}$$

$$- \quad 1,000f = 00551.\overline{35}$$

$$\hline 99000f = 54584$$

$$f = \frac{54584}{99000}$$

2) $0.304\overline{1}$

$$f = 0.304\overline{1}$$

$$10,000f = 3041.\overline{41}$$

$$- \quad 100f = 0030.\overline{41}$$

$$\hline 9900f = 3011$$

$$f = \frac{3011}{9900}$$

3) $35.1\overline{39}$

$$f = 35.1\overline{39}$$

$$1,000f = 35139.\overline{39}$$

$$- \quad 10f = 00351.\overline{39}$$

$$\hline 990f = 34788$$

$$f = \frac{34788}{990}$$

4) $5.7\overline{4}$

$$f = 5.7\overline{4}$$

$$100f = 574.\overline{4}$$

$$- \quad 10f = 057.\overline{4}$$

$$\hline 90f = 517$$

$$f = \frac{517}{90}$$

5) $8.151\overline{51}$

$$f = 8.151\overline{51}$$

$$100,000f = 815151.\overline{51}$$

$$- \quad 1,000f = 008151.\overline{51}$$

$$\hline 99000f = 807000$$

$$f = \frac{807000}{99000}$$

6) $5.545\overline{9}$

$$f = 5.545\overline{9}$$

$$10,000f = 55459.\overline{9}$$

$$- \quad 1,000f = 05546.\overline{9}$$

$$\hline 9000f = 49914$$

$$f = \frac{49914}{9000}$$

7) $6.41\overline{32}$

$$f = 6.41\overline{32}$$

$$10,000f = 64132.\overline{32}$$

$$- \quad 100f = 00641.\overline{32}$$

$$\hline 9900f = 63491$$

$$f = \frac{63491}{9900}$$

8) $3.28\overline{9}$

$$f = 3.28\overline{9}$$

$$1,000f = 3289.\overline{9}$$

$$- \quad 100f = 0329.\overline{9}$$

$$\hline 900f = 2961$$

$$f = \frac{2961}{900}$$

9) $0.5\overline{31}$

$$f = 0.5\overline{31}$$

$$1,000f = 531.\overline{31}$$

$$- \quad 10f = 005.\overline{31}$$

$$\hline 990f = 526$$

$$f = \frac{526}{990}$$

10) $0.83\overline{1}$

$$f = 0.83\overline{1}$$

$$1,000f = 831.\overline{1}$$

$$- \quad 100f = 083.\overline{1}$$

$$\hline 900f = 748$$

$$f = \frac{748}{900}$$

1.	$\frac{54584}{99000}$
2.	$\frac{3011}{9900}$
3.	$\frac{34788}{990}$
4.	$\frac{517}{90}$
5.	$\frac{807000}{99000}$
6.	$\frac{49914}{9000}$
7.	$\frac{63491}{9900}$
8.	$\frac{2961}{900}$
9.	$\frac{526}{990}$
10.	$\frac{748}{900}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $9.298\overline{4}$

2) $3.61\overline{4}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $1.232\overline{16}$

4) $74.3\overline{35}$

5) $0.19\overline{6}$

6) $0.894\overline{30}$

7) $0.24\overline{55}$

8) $43.9\overline{1}$

9) $0.110\overline{6}$

10) $3.3\overline{10}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $9.298\overline{4}$

$$f = 9.298\overline{4}$$

$$10,000f = 92984.\overline{4}$$

$$- 1,000f = 09298.\overline{4}$$

$$9000f = 83686$$

$$f = \frac{83686}{9000}$$

2) $3.61\overline{4}$

$$f = 3.61\overline{4}$$

$$1,000f = 3614.\overline{4}$$

$$- 100f = 0361.\overline{4}$$

$$900f = 3253$$

$$f = \frac{3253}{900}$$

3) $1.2321\overline{6}$

$$f = 1.2321\overline{6}$$

$$100,000f = 123216.\overline{16}$$

$$- 1,000f = 001232.\overline{16}$$

$$99000f = 121984$$

$$f = \frac{121984}{99000}$$

4) $74.3\overline{35}$

$$f = 74.3\overline{35}$$

$$1,000f = 74335.\overline{35}$$

$$- 10f = 00743.\overline{35}$$

$$990f = 73592$$

$$f = \frac{73592}{990}$$

5) $0.19\overline{6}$

$$f = 0.19\overline{6}$$

$$1,000f = 196.\overline{96}$$

$$- 10f = 001.9\overline{6}$$

$$990f = 195$$

$$f = \frac{195}{990}$$

6) $0.8943\overline{0}$

$$f = 0.8943\overline{0}$$

$$100,000f = 89430.\overline{30}$$

$$- 1,000f = 00894.\overline{30}$$

$$99000f = 88536$$

$$f = \frac{88536}{99000}$$

7) $0.245\overline{5}$

$$f = 0.245\overline{5}$$

$$10,000f = 2455.\overline{55}$$

$$- 100f = 0024.\overline{55}$$

$$9900f = 2431$$

$$f = \frac{2431}{9900}$$

8) $43.9\overline{1}$

$$f = 43.9\overline{1}$$

$$100f = 4391.\overline{1}$$

$$- 10f = 0439.\overline{1}$$

$$90f = 3952$$

$$f = \frac{3952}{90}$$

9) $0.110\overline{6}$

$$f = 0.110\overline{6}$$

$$10,000f = 1106.\overline{6}$$

$$- 1,000f = 0110.\overline{6}$$

$$9000f = 996$$

$$f = \frac{996}{9000}$$

10) $3.31\overline{0}$

$$f = 3.31\overline{0}$$

$$1,000f = 3310.\overline{10}$$

$$- 10f = 0033.\overline{10}$$

$$990f = 3277$$

$$f = \frac{3277}{990}$$

1.	$\frac{83686}{9000}$
2.	$\frac{3253}{900}$
3.	$\frac{121984}{99000}$
4.	$\frac{73592}{990}$
5.	$\frac{195}{990}$
6.	$\frac{88536}{99000}$
7.	$\frac{2431}{9900}$
8.	$\frac{3952}{90}$
9.	$\frac{996}{9000}$
10.	$\frac{3277}{990}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $0.9\overline{77}$

2) $2.5\overline{6}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $9.5\overline{11}$

4) $0.907\overline{56}$

5) $0.92\overline{6}$

6) $8.34\overline{4}$

7) $8.606\overline{32}$

8) $3.955\overline{4}$

9) $5.728\overline{8}$

10) $68.5\overline{4}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

1) $0.9\overline{77}$

$$f = 0.9\overline{77}$$

$$1,000f = 977.\overline{77}$$

$$\begin{array}{r} - 10f = 009.\overline{77} \\ \hline \end{array}$$

$$990f = 968$$

$$f = \frac{968}{990}$$

2) $2.5\overline{6}$

$$f = 2.5\overline{6}$$

$$100f = 256.\overline{6}$$

$$\begin{array}{r} - 10f = 025.\overline{6} \\ \hline \end{array}$$

$$90f = 231$$

$$f = \frac{231}{90}$$

3) $9.5\overline{11}$

$$f = 9.5\overline{11}$$

$$1,000f = 9511.\overline{11}$$

$$\begin{array}{r} - 10f = 0095.\overline{11} \\ \hline \end{array}$$

$$990f = 9416$$

$$f = \frac{9416}{990}$$

4) $0.907\overline{56}$

$$f = 0.907\overline{56}$$

$$100,000f = 90756.\overline{56}$$

$$\begin{array}{r} - 1,000f = 00907.\overline{56} \\ \hline \end{array}$$

$$99000f = 89849$$

$$f = \frac{89849}{99000}$$

5) $0.92\overline{6}$

$$f = 0.92\overline{6}$$

$$1,000f = 926.\overline{6}$$

$$\begin{array}{r} - 100f = 092.\overline{6} \\ \hline \end{array}$$

$$900f = 834$$

$$f = \frac{834}{900}$$

6) $8.34\overline{4}$

$$f = 8.34\overline{4}$$

$$1,000f = 8344.\overline{4}$$

$$\begin{array}{r} - 100f = 0834.\overline{4} \\ \hline \end{array}$$

$$900f = 7510$$

$$f = \frac{7510}{900}$$

7) $8.606\overline{32}$

$$f = 8.606\overline{32}$$

$$100,000f = 860632.\overline{32}$$

$$\begin{array}{r} - 1,000f = 008606.\overline{32} \\ \hline \end{array}$$

$$99000f = 852026$$

$$f = \frac{852026}{99000}$$

8) $3.95\overline{54}$

$$f = 3.95\overline{54}$$

$$10,000f = 39554.\overline{54}$$

$$\begin{array}{r} - 100f = 00395.\overline{54} \\ \hline \end{array}$$

$$9900f = 39159$$

$$f = \frac{39159}{9900}$$

9) $5.728\overline{8}$

$$f = 5.728\overline{8}$$

$$10,000f = 57288.\overline{8}$$

$$\begin{array}{r} - 1,000f = 05728.\overline{8} \\ \hline \end{array}$$

$$9000f = 51560$$

$$f = \frac{51560}{9000}$$

10) $68.5\overline{4}$

$$f = 68.5\overline{4}$$

$$100f = 6854.\overline{4}$$

$$\begin{array}{r} - 10f = 0685.\overline{4} \\ \hline \end{array}$$

$$90f = 6169$$

$$f = \frac{6169}{90}$$

Answers

1. $\frac{968}{990}$
2. $\frac{231}{90}$
3. $\frac{9416}{990}$
4. $\frac{89849}{99000}$
5. $\frac{834}{900}$
6. $\frac{7510}{900}$
7. $\frac{852026}{99000}$
8. $\frac{39159}{9900}$
9. $\frac{51560}{9000}$
10. $\frac{6169}{90}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $0.497\overline{71}$

2) $0.44\overline{8}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $0.952\overline{4}$

4) $36.98\overline{2}$

5) $4.546\overline{5}$

6) $8.47\overline{4}$

7) $0.37\overline{7}$

8) $4.96\overline{8}$

9) $91.8\overline{3}$

10) $8.1921\overline{3}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $0.497\overline{71}$

$$f = 0.497\overline{71}$$

$$100,000f = 49771.\overline{71}$$

$$\begin{array}{r} - 1,000f = 00497.\overline{71} \\ \hline \end{array}$$

$$99000f = 49274$$

$$f = \frac{49274}{99000}$$

2) $0.4\overline{48}$

$$f = 0.4\overline{48}$$

$$1,000f = 448.\overline{48}$$

$$\begin{array}{r} - 10f = 004.\overline{48} \\ \hline \end{array}$$

$$990f = 444$$

$$f = \frac{444}{990}$$

3) $0.952\overline{4}$

$$f = 0.952\overline{4}$$

$$10,000f = 9524.\overline{4}$$

$$\begin{array}{r} - 1,000f = 0952.\overline{4} \\ \hline \end{array}$$

$$9000f = 8572$$

$$f = \frac{8572}{9000}$$

4) $36.98\overline{2}$

$$f = 36.98\overline{2}$$

$$1,000f = 36982.\overline{2}$$

$$\begin{array}{r} - 10f = 00369.\overline{2} \\ \hline \end{array}$$

$$990f = 36613$$

$$f = \frac{36613}{990}$$

5) $4.546\overline{5}$

$$f = 4.546\overline{5}$$

$$10,000f = 45465.\overline{5}$$

$$\begin{array}{r} - 1,000f = 04546.\overline{5} \\ \hline \end{array}$$

$$9000f = 40919$$

$$f = \frac{40919}{9000}$$

6) $8.47\overline{4}$

$$f = 8.47\overline{4}$$

$$1,000f = 8474.\overline{4}$$

$$\begin{array}{r} - 100f = 0847.\overline{4} \\ \hline \end{array}$$

$$900f = 7627$$

$$f = \frac{7627}{900}$$

7) $0.37\overline{7}$

$$f = 0.37\overline{7}$$

$$1,000f = 377.\overline{7}$$

$$\begin{array}{r} - 100f = 037.\overline{7} \\ \hline \end{array}$$

$$900f = 340$$

$$f = \frac{340}{900}$$

8) $4.96\overline{8}$

$$f = 4.96\overline{8}$$

$$1,000f = 4968.\overline{8}$$

$$\begin{array}{r} - 10f = 0049.\overline{8} \\ \hline \end{array}$$

$$990f = 4919$$

$$f = \frac{4919}{990}$$

9) $91.8\overline{3}$

$$f = 91.8\overline{3}$$

$$100f = 9183.\overline{3}$$

$$\begin{array}{r} - 10f = 0918.\overline{3} \\ \hline \end{array}$$

$$90f = 8265$$

$$f = \frac{8265}{90}$$

10) $8.1921\overline{3}$

$$f = 8.1921\overline{3}$$

$$100,000f = 819213.\overline{3}$$

$$\begin{array}{r} - 1,000f = 008192.\overline{3} \\ \hline \end{array}$$

$$99000f = 811021$$

$$f = \frac{811021}{99000}$$

1.	$\frac{49274}{99000}$
2.	$\frac{444}{990}$
3.	$\frac{8572}{9000}$
4.	$\frac{36613}{990}$
5.	$\frac{40919}{9000}$
6.	$\frac{7627}{900}$
7.	$\frac{340}{900}$
8.	$\frac{4919}{990}$
9.	$\frac{8265}{90}$
10.	$\frac{811021}{99000}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $9.12\overline{78}$

2) $0.681\overline{39}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $0.95\overline{9}$

4) $79.5\overline{28}$

5) $0.48\overline{56}$

6) $5.569\overline{46}$

7) $4.66\overline{51}$

8) $4.3\overline{6}$

9) $22.5\overline{4}$

10) $0.8\overline{62}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

$$\begin{aligned} 1) \quad & 9.12\overline{78} \\ & f = 9.12\overline{78} \\ & 10,000f = 91278.\overline{78} \\ & - \quad 100f = 00912.\overline{78} \\ & \hline & 9900f = 90366 \\ & f = \frac{90366}{9900} \end{aligned}$$

$$\begin{aligned} 2) \quad & 0.681\overline{39} \\ & f = 0.681\overline{39} \\ & 100,000f = 68139.\overline{39} \\ & - \quad 1,000f = 00681.\overline{39} \\ & \hline & 99000f = 67458 \\ & f = \frac{67458}{99000} \end{aligned}$$

$$\begin{aligned} 3) \quad & 0.95\overline{9} \\ & f = 0.95\overline{9} \\ & 1,000f = 959.\overline{9} \\ & - \quad 100f = 096.\overline{9} \\ & \hline & 900f = 864 \\ & f = \frac{864}{900} \end{aligned}$$

$$\begin{aligned} 4) \quad & 79.5\overline{28} \\ & f = 79.5\overline{28} \\ & 1,000f = 79528.\overline{28} \\ & - \quad 10f = 00795.\overline{28} \\ & \hline & 990f = 78733 \\ & f = \frac{78733}{990} \end{aligned}$$

$$\begin{aligned} 5) \quad & 0.48\overline{56} \\ & f = 0.48\overline{56} \\ & 10,000f = 4856.\overline{56} \\ & - \quad 100f = 0048.\overline{56} \\ & \hline & 9900f = 4808 \\ & f = \frac{4808}{9900} \end{aligned}$$

$$\begin{aligned} 6) \quad & 5.569\overline{46} \\ & f = 5.569\overline{46} \\ & 100,000f = 556946.\overline{46} \\ & - \quad 1,000f = 005569.\overline{46} \\ & \hline & 99000f = 551377 \\ & f = \frac{551377}{99000} \end{aligned}$$

$$\begin{aligned} 7) \quad & 4.665\overline{1} \\ & f = 4.665\overline{1} \\ & 10,000f = 46651.\overline{1} \\ & - \quad 1,000f = 04665.\overline{1} \\ & \hline & 9000f = 41986 \\ & f = \frac{41986}{9000} \end{aligned}$$

$$\begin{aligned} 8) \quad & 4.\overline{36} \\ & f = 4.\overline{36} \\ & 100f = 436.\overline{6} \\ & - \quad 10f = 043.\overline{6} \\ & \hline & 90f = 393 \\ & f = \frac{393}{90} \end{aligned}$$

$$\begin{aligned} 9) \quad & 22.\overline{54} \\ & f = 22.\overline{54} \\ & 100f = 2254.\overline{4} \\ & - \quad 10f = 0225.\overline{4} \\ & \hline & 90f = 2029 \\ & f = \frac{2029}{90} \end{aligned}$$

$$\begin{aligned} 10) \quad & 0.\overline{862} \\ & f = 0.\overline{862} \\ & 1,000f = 862.\overline{62} \\ & - \quad 10f = 008.\overline{62} \\ & \hline & 990f = 854 \\ & f = \frac{854}{990} \end{aligned}$$

1.	$\frac{90366}{9900}$
2.	$\frac{67458}{99000}$
3.	$\frac{864}{900}$
4.	$\frac{78733}{990}$
5.	$\frac{4808}{9900}$
6.	$\frac{551377}{99000}$
7.	$\frac{41986}{9000}$
8.	$\frac{393}{90}$
9.	$\frac{2029}{90}$
10.	$\frac{854}{990}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $6.985\overline{5}$

2) $69.8\overline{9}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $7.76\overline{28}$

4) $0.1\overline{75}$

5) $0.889\overline{3}$

6) $2.17\overline{1}$

7) $9.7\overline{6}$

8) $3.84\overline{5}$

9) $0.851\overline{29}$

10) $0.544\overline{5}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $6.985\overline{5}$

$$f = 6.985\overline{5}$$

$$10,000f = 69855.\overline{5}$$

$$\begin{array}{r} 10,000f = 69855.\overline{5} \\ - 1,000f = 06985.\overline{5} \\ \hline \end{array}$$

$$9000f = 62870$$

$$f = \frac{62870}{9000}$$

2) $69.8\overline{9}$

$$f = 69.8\overline{9}$$

$$100f = 6989.\overline{9}$$

$$\begin{array}{r} 100f = 6989.\overline{9} \\ - 10f = 0699.\overline{9} \\ \hline \end{array}$$

$$90f = 6291$$

$$f = \frac{6291}{90}$$

3) $7.762\overline{8}$

$$f = 7.762\overline{8}$$

$$10,000f = 77628.\overline{28}$$

$$\begin{array}{r} 10,000f = 77628.\overline{28} \\ - 100f = 00776.\overline{28} \\ \hline \end{array}$$

$$9900f = 76852$$

$$f = \frac{76852}{9900}$$

4) $0.17\overline{5}$

$$f = 0.17\overline{5}$$

$$1,000f = 175.\overline{75}$$

$$\begin{array}{r} 1,000f = 175.\overline{75} \\ - 10f = 001.\overline{75} \\ \hline \end{array}$$

$$990f = 174$$

$$f = \frac{174}{990}$$

5) $0.889\overline{3}$

$$f = 0.889\overline{3}$$

$$10,000f = 8893.\overline{3}$$

$$\begin{array}{r} 10,000f = 8893.\overline{3} \\ - 1,000f = 0889.\overline{3} \\ \hline \end{array}$$

$$9000f = 8004$$

$$f = \frac{8004}{9000}$$

6) $2.17\overline{1}$

$$f = 2.17\overline{1}$$

$$1,000f = 2171.\overline{1}$$

$$\begin{array}{r} 1,000f = 2171.\overline{1} \\ - 100f = 0217.\overline{1} \\ \hline \end{array}$$

$$900f = 1954$$

$$f = \frac{1954}{900}$$

7) $9.7\overline{6}$

$$f = 9.7\overline{6}$$

$$100f = 976.\overline{6}$$

$$\begin{array}{r} 100f = 976.\overline{6} \\ - 10f = 097.\overline{6} \\ \hline \end{array}$$

$$90f = 879$$

$$f = \frac{879}{90}$$

8) $3.84\overline{5}$

$$f = 3.84\overline{5}$$

$$1,000f = 3845.\overline{45}$$

$$\begin{array}{r} 1,000f = 3845.\overline{45} \\ - 10f = 0038.\overline{45} \\ \hline \end{array}$$

$$990f = 3807$$

$$f = \frac{3807}{990}$$

9) $0.8512\overline{9}$

$$f = 0.8512\overline{9}$$

$$100,000f = 85129.\overline{29}$$

$$\begin{array}{r} 100,000f = 85129.\overline{29} \\ - 1,000f = 00851.\overline{29} \\ \hline \end{array}$$

$$99000f = 84278$$

$$f = \frac{84278}{99000}$$

10) $0.544\overline{5}$

$$f = 0.544\overline{5}$$

$$10,000f = 5445.\overline{45}$$

$$\begin{array}{r} 10,000f = 5445.\overline{45} \\ - 100f = 0054.\overline{45} \\ \hline \end{array}$$

$$9900f = 5391$$

$$f = \frac{5391}{9900}$$

1.	$\frac{62870}{9000}$
2.	$\frac{6291}{90}$
3.	$\frac{76852}{9900}$
4.	$\frac{174}{990}$
5.	$\frac{8004}{9000}$
6.	$\frac{1954}{900}$
7.	$\frac{879}{90}$
8.	$\frac{3807}{990}$
9.	$\frac{84278}{99000}$
10.	$\frac{5391}{9900}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $7.641\overline{5}$

2) $5.8\overline{34}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $4.950\overline{37}$

4) $0.574\overline{9}$

5) $7.2\overline{1}$

6) $44.4\overline{9}$

7) $2.96\overline{7}$

8) $0.368\overline{34}$

9) $0.241\overline{1}$

10) $0.53\overline{8}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $7.641\overline{5}$

$$f = 7.641\overline{5}$$

$$10,000f = 76415.\overline{5}$$

$$- 1,000f = 07641.\overline{5}$$

$$9000f = 68774$$

$$f = \frac{68774}{9000}$$

2) $5.8\overline{34}$

$$f = 5.8\overline{34}$$

$$1,000f = 5834.\overline{34}$$

$$- 10f = 0058.\overline{34}$$

$$990f = 5776$$

$$f = \frac{5776}{990}$$

3) $4.950\overline{37}$

$$f = 4.950\overline{37}$$

$$100,000f = 495037.\overline{37}$$

$$- 1,000f = 004950.\overline{37}$$

$$99000f = 490087$$

$$f = \frac{490087}{99000}$$

4) $0.574\overline{9}$

$$f = 0.574\overline{9}$$

$$10,000f = 5749.\overline{9}$$

$$- 1,000f = 0575.\overline{9}$$

$$9000f = 5175$$

$$f = \frac{5175}{9000}$$

5) $7.2\overline{1}$

$$f = 7.2\overline{1}$$

$$100f = 721.\overline{1}$$

$$- 10f = 072.\overline{1}$$

$$90f = 649$$

$$f = \frac{649}{90}$$

6) $44.4\overline{9}$

$$f = 44.4\overline{9}$$

$$100f = 4449.\overline{9}$$

$$- 10f = 0445.\overline{9}$$

$$90f = 4005$$

$$f = \frac{4005}{90}$$

7) $2.96\overline{7}$

$$f = 2.96\overline{7}$$

$$1,000f = 2967.\overline{7}$$

$$- 100f = 0296.\overline{7}$$

$$900f = 2671$$

$$f = \frac{2671}{900}$$

8) $0.368\overline{34}$

$$f = 0.368\overline{34}$$

$$100,000f = 36834.\overline{34}$$

$$- 1,000f = 00368.\overline{34}$$

$$99000f = 36466$$

$$f = \frac{36466}{99000}$$

9) $0.241\overline{1}$

$$f = 0.241\overline{1}$$

$$10,000f = 2411.\overline{11}$$

$$- 100f = 0024.\overline{11}$$

$$9900f = 2387$$

$$f = \frac{2387}{9900}$$

10) $0.53\overline{8}$

$$f = 0.53\overline{8}$$

$$1,000f = 538.\overline{8}$$

$$- 100f = 053.\overline{8}$$

$$900f = 485$$

$$f = \frac{485}{900}$$

1.	$\frac{68774}{9000}$
2.	$\frac{5776}{990}$
3.	$\frac{490087}{99000}$
4.	$\frac{5175}{9000}$
5.	$\frac{649}{90}$
6.	$\frac{4005}{90}$
7.	$\frac{2671}{900}$
8.	$\frac{36466}{99000}$
9.	$\frac{2387}{9900}$
10.	$\frac{485}{900}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $6.2\overline{9}$

2) $0.75\overline{2}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $0.393\overline{2}$

4) $68.4\overline{33}$

5) $6.48\overline{39}$

6) $21.7\overline{8}$

7) $3.530\overline{9}$

8) $1.837\overline{79}$

9) $7.92\overline{8}$

10) $3.7\overline{30}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

1) $6.2\overline{9}$

$$\begin{aligned} f &= 6.2\overline{9} \\ 100f &= 629.\overline{9} \\ - 10f &= 63.\overline{9} \\ \hline 90f &= 567 \\ f &= \frac{567}{90} \end{aligned}$$

2) $0.75\overline{2}$

$$\begin{aligned} f &= 0.75\overline{2} \\ 1,000f &= 752.\overline{2} \\ - 100f &= 75.\overline{2} \\ \hline 900f &= 677 \\ f &= \frac{677}{900} \end{aligned}$$

3) $0.393\overline{2}$

$$\begin{aligned} f &= 0.393\overline{2} \\ 10,000f &= 3932.\overline{2} \\ - 1,000f &= 393.\overline{2} \\ \hline 9000f &= 3539 \\ f &= \frac{3539}{9000} \end{aligned}$$

4) $68.4\overline{33}$

$$\begin{aligned} f &= 68.4\overline{33} \\ 1,000f &= 68433.\overline{33} \\ - 10f &= 684.\overline{33} \\ \hline 990f &= 67749 \\ f &= \frac{67749}{990} \end{aligned}$$

5) $6.483\overline{9}$

$$\begin{aligned} f &= 6.483\overline{9} \\ 10,000f &= 64839.\overline{9} \\ - 100f &= 648.\overline{9} \\ \hline 9900f &= 64191 \\ f &= \frac{64191}{9900} \end{aligned}$$

6) $21.7\overline{8}$

$$\begin{aligned} f &= 21.7\overline{8} \\ 100f &= 2178.\overline{8} \\ - 10f &= 217.\overline{8} \\ \hline 90f &= 1961 \\ f &= \frac{1961}{90} \end{aligned}$$

7) $3.530\overline{9}$

$$\begin{aligned} f &= 3.530\overline{9} \\ 10,000f &= 35309.\overline{9} \\ - 1,000f &= 3531.\overline{9} \\ \hline 9000f &= 31779 \\ f &= \frac{31779}{9000} \end{aligned}$$

8) $1.837\overline{79}$

$$\begin{aligned} f &= 1.837\overline{79} \\ 100,000f &= 183779.\overline{79} \\ - 1,000f &= 1837.\overline{79} \\ \hline 99000f &= 181942 \\ f &= \frac{181942}{99000} \end{aligned}$$

9) $7.92\overline{8}$

$$\begin{aligned} f &= 7.92\overline{8} \\ 1,000f &= 7928.\overline{8} \\ - 100f &= 792.\overline{8} \\ \hline 900f &= 7136 \\ f &= \frac{7136}{900} \end{aligned}$$

10) $3.7\overline{30}$

$$\begin{aligned} f &= 3.7\overline{30} \\ 1,000f &= 3730.\overline{30} \\ - 10f &= 37.\overline{30} \\ \hline 990f &= 3693 \\ f &= \frac{3693}{990} \end{aligned}$$

Answers

1. $\frac{567}{90}$
2. $\frac{677}{900}$
3. $\frac{3539}{9000}$
4. $\frac{67749}{990}$
5. $\frac{64191}{9900}$
6. $\frac{1961}{90}$
7. $\frac{31779}{9000}$
8. $\frac{181942}{99000}$
9. $\frac{7136}{900}$
10. $\frac{3693}{990}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $43.\overline{355}$

2) $0.81\overline{50}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $2.604\overline{6}$

4) $1.69\overline{8}$

5) $0.3\overline{20}$

6) $7.5\overline{9}$

7) $0.62\overline{9}$

8) $1.910\overline{36}$

9) $23.3\overline{8}$

10) $0.581\overline{2}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

$$\begin{aligned} 1) \quad & 43.\overline{355} \\ & f = 43.\overline{355} \\ & 1,000f = 43355.\overline{55} \\ & - \quad 10f = 00433.\overline{55} \\ & \hline & 990f = 42922 \\ & f = \frac{42922}{990} \end{aligned}$$

$$\begin{aligned} 2) \quad & 0.81\overline{50} \\ & f = 0.81\overline{50} \\ & 10,000f = 8150.\overline{50} \\ & - \quad 100f = 0081.\overline{50} \\ & \hline & 9900f = 8069 \\ & f = \frac{8069}{9900} \end{aligned}$$

$$\begin{aligned} 3) \quad & 2.604\overline{6} \\ & f = 2.604\overline{6} \\ & 10,000f = 26046.\overline{6} \\ & - \quad 1,000f = 02604.\overline{6} \\ & \hline & 9000f = 23442 \\ & f = \frac{23442}{9000} \end{aligned}$$

$$\begin{aligned} 4) \quad & 1.69\overline{8} \\ & f = 1.69\overline{8} \\ & 1,000f = 1698.\overline{8} \\ & - \quad 100f = 0169.\overline{8} \\ & \hline & 900f = 1529 \\ & f = \frac{1529}{900} \end{aligned}$$

$$\begin{aligned} 5) \quad & 0.3\overline{20} \\ & f = 0.3\overline{20} \\ & 1,000f = 320.\overline{20} \\ & - \quad 10f = 003.\overline{20} \\ & \hline & 990f = 317 \\ & f = \frac{317}{990} \end{aligned}$$

$$\begin{aligned} 6) \quad & 7.5\overline{9} \\ & f = 7.5\overline{9} \\ & 100f = 759.\overline{9} \\ & - \quad 10f = 076.\overline{9} \\ & \hline & 90f = 684 \\ & f = \frac{684}{90} \end{aligned}$$

$$\begin{aligned} 7) \quad & 0.62\overline{9} \\ & f = 0.62\overline{9} \\ & 1,000f = 629.\overline{9} \\ & - \quad 100f = 063.\overline{9} \\ & \hline & 900f = 567 \\ & f = \frac{567}{900} \end{aligned}$$

$$\begin{aligned} 8) \quad & 1.9103\overline{6} \\ & f = 1.9103\overline{6} \\ & 100,000f = 191036.\overline{36} \\ & - \quad 1,000f = 001910.\overline{36} \\ & \hline & 99000f = 189126 \\ & f = \frac{189126}{99000} \end{aligned}$$

$$\begin{aligned} 9) \quad & 23.\overline{38} \\ & f = 23.\overline{38} \\ & 100f = 2338.\overline{8} \\ & - \quad 10f = 0233.\overline{8} \\ & \hline & 90f = 2105 \\ & f = \frac{2105}{90} \end{aligned}$$

$$\begin{aligned} 10) \quad & 0.581\overline{2} \\ & f = 0.581\overline{2} \\ & 10,000f = 5812.\overline{2} \\ & - \quad 1,000f = 0581.\overline{2} \\ & \hline & 9000f = 5231 \\ & f = \frac{5231}{9000} \end{aligned}$$

1.	$\frac{42922}{990}$
2.	$\frac{8069}{9900}$
3.	$\frac{23442}{9000}$
4.	$\frac{1529}{900}$
5.	$\frac{317}{990}$
6.	$\frac{684}{90}$
7.	$\frac{567}{900}$
8.	$\frac{189126}{99000}$
9.	$\frac{2105}{90}$
10.	$\frac{5231}{9000}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $0.86\overline{18}$

2) $8.379\overline{4}$

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

3) $4.6\overline{55}$

4) $0.777\overline{7}$

5) $0.98\overline{0}$

6) $38.2\overline{1}$

7) $3.43\overline{8}$

8) $0.83\overline{9}$

9) $9.9\overline{6}$

10) $0.736\overline{64}$



Rewrite each infinitely repeating decimal as a rational number (fraction).

Answers

1) $0.86\overline{18}$
 $f = 0.86\overline{18}$
 $10,000f = 8618.\overline{18}$
 $- \quad 100f = 0086.\overline{18}$
 $\hline 9900f = 8532$
 $f = \frac{8532}{9900}$

2) $8.379\overline{4}$
 $f = 8.379\overline{4}$
 $10,000f = 83794.\overline{4}$
 $- \quad 1,000f = 08379.\overline{4}$
 $\hline 9000f = 75415$
 $f = \frac{75415}{9000}$

3) $4.6\overline{55}$
 $f = 4.6\overline{55}$
 $1,000f = 4655.\overline{55}$
 $- \quad 10f = 0046.\overline{55}$
 $\hline 990f = 4609$
 $f = \frac{4609}{990}$

4) $0.777\overline{7}$
 $f = 0.777\overline{7}$
 $10,000f = 7777.\overline{7}$
 $- \quad 1,000f = 0777.\overline{7}$
 $\hline 9000f = 7000$
 $f = \frac{7000}{9000}$

5) $0.9\overline{80}$
 $f = 0.9\overline{80}$
 $1,000f = 980.\overline{80}$
 $- \quad 10f = 009.\overline{80}$
 $\hline 990f = 971$
 $f = \frac{971}{990}$

6) $38.2\overline{1}$
 $f = 38.2\overline{1}$
 $100f = 3821.\overline{1}$
 $- \quad 10f = 0382.\overline{1}$
 $\hline 90f = 3439$
 $f = \frac{3439}{90}$

7) $3.43\overline{8}$
 $f = 3.43\overline{8}$
 $1,000f = 3438.\overline{8}$
 $- \quad 100f = 0343.\overline{8}$
 $\hline 900f = 3095$
 $f = \frac{3095}{900}$

8) $0.83\overline{9}$
 $f = 0.83\overline{9}$
 $1,000f = 839.\overline{9}$
 $- \quad 100f = 084.\overline{9}$
 $\hline 900f = 756$
 $f = \frac{756}{900}$

9) $9.9\overline{6}$
 $f = 9.9\overline{6}$
 $100f = 996.\overline{6}$
 $- \quad 10f = 099.\overline{6}$
 $\hline 90f = 897$
 $f = \frac{897}{90}$

10) $0.736\overline{64}$
 $f = 0.736\overline{64}$
 $100,000f = 73664.\overline{64}$
 $- \quad 1,000f = 00736.\overline{64}$
 $\hline 99000f = 72928$
 $f = \frac{72928}{99000}$

1. $\frac{8532}{9900}$
 2. $\frac{75415}{9000}$
 3. $\frac{4609}{990}$
 4. $\frac{7000}{9000}$
 5. $\frac{971}{990}$
 6. $\frac{3439}{90}$
 7. $\frac{3095}{900}$
 8. $\frac{756}{900}$
 9. $\frac{897}{90}$
 10. $\frac{72928}{99000}$