Espressioni con frazioni doppie (frazioni composte)
Evaluating Expressions Involving Complex Fractions

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1. $$\frac{\frac{1}{5}}{1-\frac{1}{2}+\frac{1}{5}}=$$ $\left[\frac{2}{7}\right]$

2. $$\frac{2+\frac{2}{3}}{1-\frac{1}{2}}=$$ $\left[\frac{16}{3}\right]$

3. $$\frac{1-\frac{1}{3}}{1+\frac{1}{3}}=$$ $\left[\frac{1}{2}\right]$

4. $$\frac{2-\frac{1}{4}}{2+\frac{1}{4}}=$$ $\left[\frac{7}{9}\right]$

5. $$\frac{\left(1-\frac{5}{9}\right):\left(1-\frac{3}{5}\right)}{\left(2+\frac{1}{3}\right)-\left(1+\frac{1}{2}\right)}=$$ $\left[\frac{4}{3}\right]$

6. $$\frac{\left(\frac{7}{2}-3\right)\cdot 2}{\left(1+\frac{5}{8}\right)\div\frac{13}{2}}=$$ $[1]$

7. $$\frac{\left(\frac{7}{2}+\frac{1}{3}\right)\div\left(7+\frac{2}{3}\right)}{\left(1+\frac{5}{4}\right)\div 5}=$$ $\left[\frac{10}{9}\right]$

8. $$\frac{\frac{6}{5}-\frac{10}{9}}{\left(\frac{5}{4}+\frac{1}{20}\right)\cdot\frac{1}{9}}=$$ $\left[\frac{2}{3}\right]$

9. $$\frac{\left(1+\frac{1}{3}\right)\cdot\left(1-\frac{1}{2}\right):\left(1-\frac{1}{2}\right)}{\left(\frac{3}{2}-1\right)\cdot 2+\frac{1}{4}}=$$ $\left[\frac{16}{15}\right]$

10. $$\frac{\left(\frac{2}{3}-\frac{1}{2}\right)\div\frac{7}{3}}{\frac{5}{9}\cdot\left(1-\frac{7}{10}\right)}$$ $\left[\frac{3}{7}\right]$

11. $\dfrac{\frac{7}{6}+\frac{5}{3}-\frac{1}{2}}{\left(\frac{11}{12}+\frac{1}{3}\right)-\frac{1}{4}}=$ $\left[\frac{7}{3}\right]$

12. $\dfrac{\left(2-\frac{1}{2}-\frac{1}{3}\right)\div\left(2-\frac{1}{2}+\frac{1}{3}\right)\cdot\left(1+\frac{1}{2}+\frac{1}{3}\right)}{2+\frac{1}{2}-\frac{2}{3}}=$ $\left[\frac{7}{11}\right]$

13. $\dfrac{\left(\frac{1}{2}-\frac{1}{6}+\frac{3}{9}\right)\cdot\frac{3}{4}}{\left[\left(\frac{2}{3}+\frac{3}{4}\right)+\left(\frac{5}{6}-\frac{7}{12}\right)\right]\cdot\frac{2}{10}}=$ $\left[\frac{3}{2}\right]$

14. $\dfrac{1+\frac{1}{2}+\frac{1}{3}-\frac{1}{4}\cdot\left(1+\frac{2}{3}\right)}{\frac{17}{3}\cdot\frac{1}{17}+7\cdot\frac{1}{14}}=$ $\left[\frac{17}{10}\right]$

15. $\dfrac{\frac{5}{3}-\left(\frac{1}{3}-\frac{1}{9}\right)}{\left(\frac{7}{2}-\frac{4}{5}\right)\cdot\left(\frac{1}{3}+\frac{2}{9}\right)\cdot\frac{2}{9}}=$ $\left[\frac{13}{3}\right]$

16. $\dfrac{\left(\frac{3}{2}+\frac{1}{4}\right)\cdot\left(1-\frac{9}{14}\right)}{\left(1-\frac{7}{22}\right)\cdot\left(\frac{3}{5}-\frac{5}{12}\right)}=$ $[5]$

17. $\dfrac{\left(\frac{23}{4}-\frac{31}{8}\right):\left(\frac{29}{6}-\frac{11}{3}\right)}{\left(\frac{4}{7}+\frac{5}{4}\right):\frac{17}{7}}=$ $\left[\frac{15}{7}\right]$

18. $\dfrac{\left(\frac{18}{10}-\frac{145}{100}\right):\left(1-\frac{1}{2}\right)}{\left(\frac{1}{10}+\frac{33}{100}-\frac{355}{1000}\right):\left(1-\frac{4}{5}\right)}=$ $\left[\frac{28}{25}\right]$

19. $1-\left(\frac{3}{8}\right)^2\div\dfrac{\frac{7}{12}}{\frac{7}{3}}\cdot\left(\frac{2}{3}\right)^2=$ $\left[\frac{3}{4}\right]$

20. $20\div\dfrac{\frac{32}{3}\cdot\left(1-\frac{1}{2}\right)^3}{3\cdot\left(\frac{2}{3}-\frac{1}{2}\right)^2-\frac{1}{20}}=$ $\left[\frac{1}{2}\right]$

21. $\dfrac{7}{8}+\dfrac{7}{8}\div\dfrac{\dfrac{6}{5}+\left(\dfrac{7}{3}-\dfrac{2}{15}\right)\cdot\left(\dfrac{2}{11}-\dfrac{1}{11}\right)}{\dfrac{13}{4}\div\left(2-\dfrac{1}{7}\right)+\left(1-\dfrac{1}{4}\right)}=$ $\left[\dfrac{39}{16}\right]$

22. $\dfrac{1-\dfrac{13}{18}}{1+\dfrac{1}{9}}+\dfrac{\dfrac{7}{16}}{\dfrac{21}{20}}=$ $\left[\dfrac{2}{3}\right]$

23. $\left(\dfrac{1}{3}+\dfrac{5}{3}\right)-\dfrac{1}{5}\cdot\dfrac{4+\dfrac{39}{4}\div\left(\dfrac{5}{2}-\dfrac{1}{3}\right)}{2+\dfrac{1}{6}\div\left(\dfrac{5}{4}+\dfrac{1}{12}\right)}=$ $\left[\dfrac{6}{5}\right]$

24. $\dfrac{\left(\dfrac{1}{6}+\dfrac{8}{12}\right)\cdot\left(\dfrac{11}{7}-\dfrac{15}{14}\right)+\left(\dfrac{10}{8}-\dfrac{7}{6}\right):\left(\dfrac{1}{3}\right)^2}{\dfrac{5}{2}-\left\{\dfrac{3}{4}-\left(\dfrac{3}{2}-\dfrac{15}{14}\right):\dfrac{7}{8}\right\}\cdot\dfrac{4}{10}}=$ $\left[\dfrac{49}{72}\right]$

25. $\dfrac{\dfrac{5}{2}-\left\{\dfrac{3}{4}+\left[\left(\dfrac{16}{3}+\dfrac{5}{12}\right)-\dfrac{7}{8}\right]\cdot\dfrac{2}{13}\right\}}{\left(\dfrac{1}{6}+\dfrac{3}{4}\right)\cdot\left(\dfrac{3}{2}-\dfrac{15}{14}\right)+\left(\dfrac{5}{4}-\dfrac{7}{6}\right):\left(\dfrac{1}{3}\right)^2}=$ $\left[\dfrac{8}{7}\right]$

26. $\dfrac{\left(1+\dfrac{3}{5}\right)-\left(\dfrac{3}{4}+\dfrac{1}{2}\right)}{\left(1+\dfrac{1}{6}\right)\cdot\left(\dfrac{1}{4}-\dfrac{1}{10}\right)}\cdot\dfrac{\left(1+\dfrac{1}{2}-\dfrac{4}{11}\right)\div\left(1-\dfrac{6}{11}\right)}{\left(3+\dfrac{3}{4}\right)-\left(\dfrac{1}{2}+2\right)}=$ $[4]$

27. $\left[2-\dfrac{4}{9}\div\left(2-\dfrac{2}{3}\right)^2+\dfrac{1}{18}\right]\div\dfrac{\dfrac{1}{2}-\dfrac{5}{21}\div\dfrac{5}{3}\cdot\dfrac{7}{5}}{\left(\dfrac{1}{12}+\dfrac{3}{5}\cdot\dfrac{1}{9}\right)^2}=$ $\left[\dfrac{13}{96}\right]$

28. $\dfrac{\left[\left(\dfrac{9}{12}+\dfrac{10}{4}\right)\div\dfrac{26}{4}+\left(\dfrac{10}{8}-\dfrac{21}{18}\right)\div\dfrac{10}{12}\right]\cdot\left[\left(\dfrac{9}{15}+\dfrac{4}{2}-\dfrac{5}{3}\right)\div\dfrac{35}{45}\right]}{\left[\left(\dfrac{15}{25}-\dfrac{2}{6}\right)\cdot\dfrac{9}{12}+\left(\dfrac{4}{15}-\dfrac{11}{45}\right)\cdot\dfrac{10}{2}\right]\div\dfrac{7}{9}}=$ $\left[\dfrac{9}{5}\right]$

29. $\dfrac{\left[\left(\dfrac{15}{9}-\dfrac{1}{3}\right)^2-\left(1-\dfrac{1}{3}\right)^2\div\dfrac{3}{9}\right]\div\left[\dfrac{16}{81}\div\dfrac{16}{27}+\left(\dfrac{1}{9}\right)^2\div\dfrac{2}{30}+\dfrac{4}{27}\right]}{\left[\left(\dfrac{1}{3}+\dfrac{1}{2}\right)\div\left(\dfrac{5}{3}\right)^2+\dfrac{1}{2}\right]\cdot\left[\left(1+\dfrac{1}{8}\right)\cdot\left(\dfrac{2}{3}-\dfrac{5}{9}\right)\div\left(1-\dfrac{3}{4}\right)\right]}=$ $\left[\dfrac{5}{3}\right]$

30. $\dfrac{\dfrac{7}{6}:\left(\dfrac{1}{3}+2\right)}{\dfrac{3}{2}}+\dfrac{\dfrac{5}{6}:\left(\dfrac{1}{3}-1\right)}{1+\dfrac{3}{2}}=$ $\left[\dfrac{5}{6}\right]$

31. $$\frac{\left(\frac{2}{5}+\frac{7}{9}-\frac{3}{20}\right)\cdot\frac{6}{5}-\frac{5}{6}}{\left(\frac{1}{9}\div\frac{5}{18}+\frac{19}{9}\cdot\frac{6}{5}\right)-\frac{2}{5}\div\frac{3}{2}}=$$ $\left[\frac{3}{20}\right]$

32. $$\frac{1+\frac{1}{5}}{\left(\frac{1}{2}+2\right):\left(\frac{5}{4}-1\right)}\cdot\frac{\frac{2}{5}}{\frac{4}{3}}=$$ $\left[\frac{18}{5}\right]$

33. $$\frac{\left\{\left[\left(\frac{2}{7}-\frac{1}{5}\right)\cdot\frac{70}{3}-\left(\frac{3}{8}+\frac{3}{4}\right)\cdot\frac{2}{3}\right]\div\frac{25}{8}-\frac{1}{5}\right\}\cdot\frac{10}{3}}{\left\{\left[\frac{7}{3}-\frac{10}{5}+\left(9-\frac{3}{2}\right)\cdot\frac{1}{15}+\frac{15}{2}\right]\div\frac{106}{9}+\frac{5}{12}+\frac{1}{3}\right\}\cdot\frac{2}{3}}=$$ $\left[\frac{2}{3}\right]$

34. $$\frac{\left(\frac{11}{10}-\frac{4}{15}\right):\frac{5}{12}}{\left(\frac{14}{5}-\frac{2}{15}\right)}\cdot\frac{2}{21}=$$ $\left[\frac{1}{14}\right]$

35. $$\frac{\left(\frac{5}{2}+\frac{3}{4}\right)-\left(\frac{1}{4}+\frac{16}{15}\right)}{\frac{11}{10}-\left(\frac{1}{6}-\frac{2}{15}\right)}\cdot\frac{1}{29}=$$ $\left[\frac{1}{16}\right]$

36. $$\frac{\left(1-\frac{11}{45}\right)\cdot\left(1-\frac{7}{11}\right)^2\cdot\left(\frac{65}{2}-\left(1+\frac{1}{2}\right)^2\right)}{\left(1-\frac{1}{3}\right)^2\cdot\left(7-\frac{1}{5}\right)}=$$ [1]

37. $$2\cdot\left(\frac{\frac{1}{3}-\frac{1}{4}}{\frac{1}{6}}\right)^2-\left(\frac{\frac{1}{3}+\frac{1}{4}}{\frac{7}{6}}\right)^2=$$ $\left[\frac{1}{4}\right]$

38. $$\left(\frac{\frac{1}{3}+\frac{1}{4}}{\frac{2}{3}:\frac{4}{3}}\right)^2-2\cdot\left(\frac{\frac{1}{3}-\frac{1}{4}}{\frac{2}{7}:\frac{4}{7}}\right)^2=$$ $\left[\frac{47}{36}\right]$

39. $$\frac{2\left(\frac{1}{3}+2\right)}{3}-\frac{3\cdot\frac{1}{3}-1}{2}=$$ $\left[\frac{14}{9}\right]$

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