Name _____ Date _____

1. Add.

a) $2\frac{1}{2}+1\frac{1}{5}=3+\frac{1}{2}+\frac{1}{5}$

$=3+\left(\frac{1}{2}\times\frac{5}{5}\right)+\left(\frac{1}{5}\times\frac{2}{2}\right)$

$=3+\frac{5}{10}+\frac{2}{10}$

$=3\frac{7}{10}$

b) $2\frac{1}{2}+1\frac{3}{5}=3+\frac{1}{2}+\frac{3}{5}$

$=3+\left(\frac{1}{2}\times\frac{5}{5}\right)+\left(\frac{3}{5}\times\frac{2}{2}\right)$

$=3+\frac{5}{10}+\frac{6}{10}$

$=3+\frac{11}{10}=3+1\frac{1}{10}=4\frac{1}{10}$

c) $1\frac{1}{5}+3\frac{1}{3}=4+\frac{1}{5}+\frac{1}{3}$

$=4+\left(\frac{1}{5}\times\frac{3}{3}\right)+\left(\frac{1}{3}\times\frac{5}{5}\right)$

$=4+\frac{3}{15}+\frac{5}{15}$

$=4\frac{8}{15}$

d) $3\frac{2}{3}+1\frac{3}{5}=4+\frac{2}{3}+\frac{3}{5}$

$=4+\left(\frac{2}{3}\times\frac{5}{5}\right)+\left(\frac{3}{5}\times\frac{3}{3}\right)$

$=4+\frac{10}{15}+\frac{9}{15}$

$=4+\frac{19}{15}=5\frac{4}{15}$

e) $2\frac{1}{3}+4\frac{4}{7}=6+\frac{1}{3}+\frac{4}{7}$

$=6+\left(\frac{1}{3}\times\frac{7}{7}\right)+\left(\frac{4}{7}\times\frac{3}{3}\right)$

$=6+\frac{7}{21}+\frac{12}{21}$

$=6\frac{19}{21}$

f) $3\frac{5}{7}+4\frac{2}{3}=7+\frac{5}{7}+\frac{2}{3}$

$=7+\left(\frac{5}{7}\times\frac{3}{3}\right)+\left(\frac{2}{3}\times\frac{7}{7}\right)$

$=7+\frac{15}{21}+\frac{14}{21}$

$=7+\frac{29}{21}=8\frac{8}{21}$

g) $15\frac{1}{5}+4\frac{3}{8}=19+\frac{1}{5}+\frac{3}{8}$

$=19+\left(\frac{1}{5}\times\frac{8}{8}\right)+\left(\frac{3}{8}\times\frac{5}{5}\right)$

$=19+\frac{8}{40}+\frac{15}{40}$

$=19+\frac{23}{40}$

$=19\frac{23}{40}$

h) $18\frac{3}{8}+2\frac{2}{5}=20+\frac{3}{8}+\frac{2}{5}$

$=20+\left(\frac{3}{8}\times\frac{5}{5}\right)+\left(\frac{2}{5}\times\frac{8}{8}\right)$

$=20+\frac{15}{40}+\frac{16}{40}$

$=20+\frac{31}{40}$

$=20\frac{31}{40}$

2. Angela practiced piano for $2\frac{1}{2}$ hours on Friday, $2\frac{1}{3}$ hours on Saturday, and $3\frac{2}{3}$ hours on Sunday. How much time did Angela practice piano during the weekend?

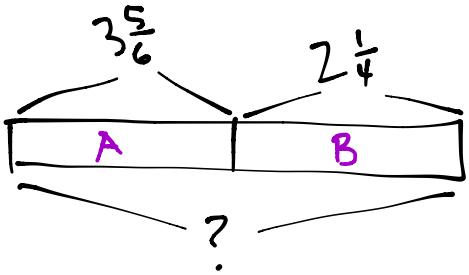
$2\frac{1}{2} + 2\frac{1}{3} + 3\frac{2}{3} = 7 + \frac{1}{2} + \frac{1}{3} + \frac{2}{3}$

$\frac{1}{3} + \frac{2}{3} = 1$

$= 8\frac{1}{2}$

Angela practiced $8\frac{1}{2}$ hours during the weekend.

3. String A is $3\frac{5}{6}$ meters long. String B is $2\frac{1}{4}$ long. What's the total length of both strings?



$3\frac{5}{6} + 2\frac{1}{4} = 5 + \frac{5}{6} + \frac{1}{4}$

$= 5 + \left(\frac{5}{6} \times \frac{2}{2}\right) + \left(\frac{1}{4} \times \frac{3}{3}\right)$

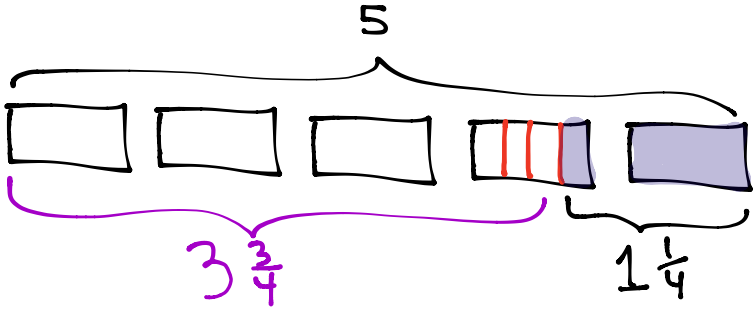
$= 5 + \frac{10}{12} + \frac{3}{12}$

$= 5 + \frac{13}{12}$

$= 6\frac{1}{12}$

The total length of both strings is $6\frac{1}{12}$ meters.

4. Matt says that $5 - 1\frac{1}{4}$ will be more than 4, since 5 – 1 is 4. Draw a picture to prove that Matt is wrong.



Matt is wrong because the picture shows the answer should be $3\frac{3}{4}$.