$1+1$ $\uparrow\uparrow$

$1\ 0$ $\frac{1}{\sqrt{2}}(\uparrow\downarrow+\downarrow\uparrow)$

1	2

$1\ -1$ $\downarrow\downarrow$

$0\ 0$ $\frac{1}{\sqrt{2}}(\uparrow\downarrow-\downarrow\uparrow)$

1
2

$\frac{3}{2}+\frac{3}{2}$ $\uparrow\uparrow\uparrow$

$\frac{3}{2}+\frac{1}{2}$ $\frac{1}{\sqrt{3}}(\uparrow\uparrow\downarrow+\uparrow\downarrow\uparrow+\downarrow\uparrow\uparrow)$

$\frac{3}{2}\ \frac{3}{2}-\frac{1}{2}$ $\frac{1}{\sqrt{3}}(\uparrow\downarrow\downarrow+\downarrow\uparrow\downarrow+\downarrow\downarrow\uparrow)$

1	2	3

$\frac{3}{2}-\frac{3}{2}$ $\downarrow\downarrow\downarrow\phi$

$\frac{1}{2}+\frac{1}{2}$ $\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow-\frac{1}{\sqrt{3}}\frac{1}{\sqrt{2}}(\uparrow\downarrow+\downarrow\uparrow)\uparrow$

$\frac{1}{2}-\frac{1}{2}$ $\frac{1}{\sqrt{3}}\frac{1}{\sqrt{2}}(\uparrow\downarrow+\downarrow\uparrow)\downarrow-\sqrt{\frac{2}{3}}\downarrow\downarrow\uparrow$

1	2
3	

$\frac{1}{2}+\frac{1}{2}$ $\frac{1}{\sqrt{2}}(\uparrow\downarrow-\downarrow\uparrow)\uparrow$

$\frac{1}{2}-\frac{1}{2}$ $\frac{1}{\sqrt{2}}(\uparrow\downarrow-\downarrow\uparrow)\downarrow$

1	3
2	

$\frac{1}{\sqrt{4}}\sqrt{\frac{2}{5}}\ \sqrt{\frac{1}{10}}$

$2+2$ $\uparrow\uparrow\uparrow\uparrow$

$2+1$ $\frac{1}{2}(\uparrow\uparrow\uparrow\downarrow+\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)$

$2\ 0$ $\frac{1}{\sqrt{6}}(\uparrow\uparrow\downarrow\downarrow+\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow+\downarrow\downarrow\uparrow\uparrow)$

$2\ -1$ $\frac{1}{2}(\uparrow\downarrow\downarrow\downarrow+\downarrow\uparrow\downarrow\downarrow+\downarrow\downarrow\uparrow\downarrow+\downarrow\downarrow\downarrow\uparrow)$

$2\ -2$ $\downarrow\downarrow\downarrow\downarrow$

1	2	3	4

$1+1$ $\frac{\sqrt{3}}{2}\uparrow\uparrow\uparrow\downarrow-\frac{1}{2\sqrt{3}}(\uparrow\uparrow\downarrow+\uparrow\downarrow\uparrow+\downarrow\uparrow\uparrow)\uparrow$

$1\ 0$ $\frac{1}{\sqrt{2}}\frac{1}{\sqrt{3}}(\uparrow\uparrow\downarrow+\uparrow\downarrow\uparrow+\downarrow\uparrow\uparrow)\downarrow+(-\frac{1}{\sqrt{2}})\frac{1}{\sqrt{3}}(\uparrow\downarrow\downarrow+\downarrow\uparrow\downarrow+\downarrow\downarrow\uparrow)\uparrow$

$1\ -1$ $\frac{1}{2}\frac{1}{\sqrt{3}}(\uparrow\downarrow\downarrow+\downarrow\uparrow\downarrow+\downarrow\downarrow\uparrow)\downarrow-\frac{\sqrt{3}}{2}\downarrow\downarrow\downarrow\uparrow$

1	2	3
4		

$1+1$ $\left[\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow-\sqrt{\frac{1}{6}}(\uparrow\downarrow\uparrow+\downarrow\uparrow\uparrow)\right]\uparrow$

1	3	4
2		

1	2	4
3		

$1\ 0$ $\sqrt{\frac{1}{2}}\left[\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow-\sqrt{\frac{1}{6}}(\uparrow\downarrow\uparrow+\downarrow\uparrow\uparrow)\right]\downarrow+\sqrt{\frac{1}{2}}\left[\sqrt{\frac{1}{6}}(\uparrow\downarrow\downarrow+\downarrow\uparrow\downarrow)-\sqrt{\frac{2}{3}}\downarrow\downarrow\uparrow\right]\uparrow$

$=\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)+\sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow)-\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow$ (2)

$1-1$ $\sqrt{\frac{1}{6}}(\uparrow\downarrow\downarrow\downarrow+\downarrow\uparrow\downarrow\downarrow)-\sqrt{\frac{2}{3}}\downarrow\downarrow\uparrow\downarrow$

1	2
3	4

$0\ 0$ $\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)-\sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow)+\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow$

1	3	4
2		

$1+1$ $\sqrt{\frac{1}{2}}(\uparrow\downarrow\uparrow\uparrow-\downarrow\uparrow\uparrow\uparrow)$

$1\ 0$ $\sqrt{\frac{1}{2}}\sqrt{\frac{1}{2}}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow)+\sqrt{\frac{1}{2}}\sqrt{\frac{1}{2}}(\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)$

$1-1$ $\sqrt{\frac{1}{2}}(\uparrow\downarrow\downarrow\downarrow-\downarrow\uparrow\downarrow\downarrow)$

1	3
2	4

$0\ 0$ $\frac{1}{2}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow)-\frac{1}{2}(\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)$

$\frac{5}{2} + \frac{5}{2}$ $\uparrow\uparrow\uparrow\uparrow\uparrow$

1	2	3	4	5

$\frac{5}{2} + \frac{3}{2}$ $\sqrt{\frac{1}{5}}(\uparrow\uparrow\uparrow\downarrow\uparrow + \uparrow\uparrow\downarrow\uparrow\uparrow + \uparrow\downarrow\uparrow\uparrow\uparrow + \downarrow\uparrow\uparrow\uparrow\uparrow + \uparrow\uparrow\uparrow\uparrow\downarrow)$

③

$\frac{5}{2} + \frac{1}{2}$ $\sqrt{\frac{1}{10}}(\uparrow\uparrow\uparrow\downarrow\downarrow + \uparrow\uparrow\downarrow\uparrow\downarrow + \uparrow\downarrow\uparrow\uparrow\downarrow + \downarrow\uparrow\uparrow\uparrow\downarrow + \uparrow\uparrow\downarrow\downarrow\uparrow$
$+ \uparrow\downarrow\uparrow\downarrow\uparrow + \downarrow\uparrow\uparrow\downarrow\uparrow + \uparrow\downarrow\downarrow\uparrow\uparrow + \downarrow\uparrow\downarrow\uparrow\uparrow + \downarrow\downarrow\uparrow\uparrow\uparrow)$

$\frac{5}{2} - \frac{1}{2}$

$\frac{5}{2} - \frac{3}{2}$

$\frac{5}{2} - \frac{5}{2}$

1	2	3	4
5			

$\frac{3}{2} + \frac{3}{2}$ ~~$\sqrt{\frac{3}{2}}\uparrow\uparrow\uparrow\downarrow\uparrow - \frac{1}{2}\sqrt{\frac{1}{3}}(\uparrow\uparrow\downarrow\uparrow + \uparrow\downarrow\uparrow\uparrow + \downarrow\uparrow\uparrow\uparrow)\uparrow$~~

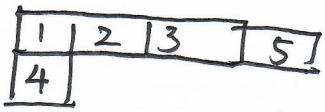
~~$\frac{3}{2} + \frac{1}{2}$~~ $\sqrt{\frac{4}{5}}\uparrow\uparrow\uparrow\uparrow\downarrow - \sqrt{\frac{1}{5}}\frac{1}{2}(\uparrow\uparrow\uparrow\downarrow + \uparrow\uparrow\downarrow\uparrow + \uparrow\downarrow\uparrow\uparrow + \downarrow\uparrow\uparrow\uparrow)\uparrow$

$\frac{3}{2} + \frac{1}{2}$ $\sqrt{\frac{3}{5}}\frac{1}{2}(\uparrow\uparrow\uparrow\downarrow + \uparrow\uparrow\downarrow\uparrow + \uparrow\downarrow\uparrow\uparrow + \downarrow\uparrow\uparrow\uparrow)\downarrow$

$-\sqrt{\frac{2}{5}}\sqrt{\frac{1}{6}}(\uparrow\uparrow\downarrow\downarrow + \uparrow\downarrow\uparrow\downarrow + \downarrow\uparrow\uparrow\downarrow + \uparrow\downarrow\downarrow\uparrow + \downarrow\uparrow\downarrow\uparrow + \downarrow\downarrow\uparrow\uparrow)\uparrow$

$\frac{3}{2} - \frac{1}{2}$

$\frac{3}{2} - \frac{3}{2}$



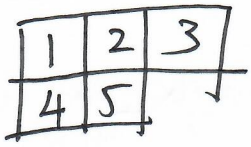
$\frac{3}{2}+\frac{3}{2}$ $\frac{\sqrt{3}}{2}\uparrow\uparrow\uparrow\downarrow\uparrow-\frac{1}{2}\sqrt{\frac{1}{3}}(\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\uparrow$

$\frac{3}{2}+\frac{1}{2}$ $\sqrt{\frac{1}{3}}(\frac{\sqrt{3}}{2}\uparrow\uparrow\uparrow\downarrow-\frac{1}{2}\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\downarrow$

$+\sqrt{\frac{2}{3}}\sqrt{\frac{1}{6}}(\uparrow\uparrow\downarrow\downarrow+\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow-\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow-\downarrow\downarrow\uparrow\uparrow)\uparrow$

$\frac{3}{2}-\frac{1}{2}$

$\frac{3}{2}-\frac{3}{2}$



$\frac{1}{2}+\frac{1}{2}$ $\sqrt{\frac{2}{3}}\frac{\sqrt{3}}{2}\uparrow\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{2}{3}}\frac{1}{2}\sqrt{\frac{1}{3}}(\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\downarrow$

~~$\frac{1}{2}-\frac{1}{2}$~~ $-\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}}(\uparrow\uparrow\downarrow\downarrow+\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)\uparrow+\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\downarrow)\uparrow$

$\frac{1}{2}-\frac{1}{2}$ $\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}}(\uparrow\uparrow\downarrow\downarrow+\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)\downarrow-\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}}(\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\uparrow$

$-\sqrt{\frac{2}{3}}\frac{1}{2}\sqrt{\frac{1}{3}}(\uparrow\downarrow\downarrow\downarrow+\downarrow\uparrow\downarrow\downarrow+\downarrow\downarrow\uparrow\downarrow)\uparrow-\sqrt{\frac{2}{3}}(\frac{-\sqrt{3}}{2})\downarrow\downarrow\downarrow\uparrow$

⑤

1	2	4	5
3			

$\frac{3}{2}+\frac{3}{2}$ $\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow\uparrow\uparrow-\sqrt{\frac{1}{6}}(\uparrow\downarrow\uparrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow\uparrow)$

$\frac{3}{2}+\frac{1}{2}$ ~~$\sqrt{\frac{1}{3}}\left[\sqrt{\frac{2}{3}}\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{2}{3}}\sqrt{\frac{1}{6}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)\right]\downarrow$~~ $\uparrow$

$\sqrt{\frac{2}{3}}\sqrt{\frac{2}{3}}\left[\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)+\sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow)-\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\right]$

$+\sqrt{\frac{2}{3}}\sqrt{\frac{1}{3}}\left(\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow\uparrow-\sqrt{\frac{1}{6}}\uparrow\downarrow\uparrow\uparrow-\sqrt{\frac{1}{6}}\downarrow\uparrow\uparrow\uparrow\right]\downarrow$.

$\frac{3}{2}-\frac{1}{2}$

$\frac{3}{2}-\frac{3}{2}$

1	2	4
3	5	

$-\sqrt{\frac{1}{6}}$

$\frac{1}{2}+\frac{1}{2}$ $\sqrt{\frac{2}{3}}\left(\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow\uparrow-\sqrt{\frac{1}{6}}\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow\right)\downarrow$.

$-\sqrt{\frac{1}{3}}\left[\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)+\sqrt{\frac{1}{12}}(\uparrow\uparrow\downarrow\downarrow+\downarrow\uparrow\downarrow\uparrow)\right.$

$\left.-\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\right]\uparrow$.

$\frac{1}{2}-\frac{1}{2}$ $\sqrt{\frac{1}{3}}\left[\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)+\sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow\right.$

$\left.+\downarrow\uparrow\downarrow\uparrow)-\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\right]\downarrow$

$-\sqrt{\frac{2}{3}}\left[\sqrt{\frac{1}{6}}(\uparrow\downarrow\downarrow\downarrow+\downarrow\uparrow\downarrow\downarrow)-\sqrt{\frac{2}{3}}\downarrow\downarrow\uparrow\downarrow)\right]\uparrow$

⑥

1	2	5
3	4	

$\frac{1}{2}+\frac{1}{2}\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow\uparrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)\uparrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow)\uparrow$

$+\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\uparrow$

$\frac{1}{2}-\frac{1}{2}\quad\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow\downarrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)\downarrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow)\downarrow$

$+\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\downarrow$

1	3	4	5
2			

$\frac{3}{2}+\frac{3}{2}\sqrt{\frac{1}{2}}(\uparrow\downarrow\uparrow\uparrow-\downarrow\uparrow\uparrow\uparrow)\uparrow$

$\frac{3}{2}+\frac{1}{2}\quad\sqrt{\frac{1}{3}}\sqrt{\frac{1}{2}}(\uparrow\downarrow\uparrow\uparrow-\downarrow\uparrow\uparrow\uparrow)\downarrow+\sqrt{\frac{2}{3}}\frac{1}{2}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\downarrow\uparrow)$

$\frac{3}{2}-\frac{1}{2}$

$\frac{3}{2}-\frac{1}{2}$

1	3	4
2	5	

$\frac{1}{2}+\frac{1}{2}\quad\sqrt{\frac{2}{3}}\sqrt{\frac{1}{2}}(\uparrow\downarrow\uparrow\uparrow-\downarrow\uparrow\uparrow\uparrow)\downarrow-\sqrt{\frac{1}{3}}\frac{1}{2}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)\uparrow$

$\frac{1}{2}-\frac{1}{2}\quad\sqrt{\frac{1}{3}}\sqrt{\frac{1}{2}}\frac{1}{2}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)\downarrow$

$-\sqrt{\frac{2}{3}}\frac{1}{2}(\uparrow\downarrow\downarrow\downarrow-\downarrow\uparrow\downarrow\downarrow)\uparrow$

1	3	5
2	4	

$\frac{1}{2}+\frac{1}{2}\quad\left[\frac{1}{2}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow)-\frac{1}{2}(\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)\right]\uparrow$

$\frac{1}{2}-\frac{1}{2}\quad\left[\frac{1}{2}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow)-\frac{1}{2}(\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)\right]\downarrow$

⑦

1	2	3	4	5	6

3 +3 $\uparrow\uparrow\uparrow\uparrow\uparrow\uparrow$

1	2	3	4	5
6				

2 +2. $\sqrt{\frac{5}{6}}\uparrow\uparrow\uparrow\uparrow\uparrow\downarrow$

$-\sqrt{\frac{1}{6}}\sqrt{\frac{1}{5}}(\uparrow\uparrow\uparrow\downarrow\uparrow+\uparrow\uparrow\downarrow\uparrow\uparrow+\uparrow\downarrow\uparrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow\uparrow+\uparrow\uparrow\uparrow\uparrow\downarrow)\uparrow$

1	2	3	4	6
5				

2 +2 $\sqrt{\frac{4}{5}}\uparrow\uparrow\uparrow\uparrow\downarrow\uparrow$

$-\frac{1}{2}\sqrt{\frac{1}{5}}(\uparrow\uparrow\uparrow\downarrow+\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\uparrow\uparrow$

1	2	3	4
5	6		

1 +1 $\sqrt{\frac{3}{4}}\left[\sqrt{\frac{4}{5}}\uparrow\uparrow\uparrow\uparrow\downarrow-\frac{1}{2}\sqrt{\frac{1}{5}}(\uparrow\uparrow\uparrow\downarrow+\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\uparrow\right]\downarrow$

$-\frac{1}{2}\left[\frac{1}{2}\sqrt{\frac{3}{5}}(\uparrow\uparrow\uparrow\downarrow+\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\downarrow\right.$

$\left.(-\sqrt{\frac{2}{5}}\sqrt{\frac{1}{6}})(\uparrow\uparrow\downarrow\downarrow+\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow+\downarrow\downarrow\uparrow\uparrow)\right.$

$\left.\uparrow\right]\uparrow$

⑧

1	2	3	4
5	6		

1+1. $\sqrt{\frac{3}{4}}\left[\sqrt{\frac{4}{5}}\uparrow\uparrow\uparrow\uparrow\downarrow - \frac{1}{2}\sqrt{\frac{1}{5}}(\uparrow\uparrow\uparrow\downarrow+\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\uparrow\right]\downarrow$

$-\sqrt{\frac{1}{4}}\frac{1}{2}\sqrt{\frac{3}{5}}(\uparrow\uparrow\uparrow\downarrow+\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\downarrow)\uparrow$

$\left[-\sqrt{\frac{1}{4}}\left(-\sqrt{\frac{2}{5}}\sqrt{\frac{1}{6}}\right)(\uparrow\uparrow\downarrow\downarrow+\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow\right.$

$\left.+\downarrow\downarrow\uparrow\uparrow)\uparrow\uparrow\right]$.

1	2	3	5	6
4				

2+2. $\frac{\sqrt{3}}{2}\uparrow\uparrow\uparrow\downarrow\uparrow\uparrow - \frac{1}{2}\sqrt{\frac{1}{3}}(\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\uparrow\uparrow$.

1	2	3	5
4	6		

1+1 $\sqrt{\frac{3}{2}}\left(\frac{\sqrt{3}}{2}\uparrow\uparrow\uparrow\downarrow\uparrow\downarrow - \frac{1}{2}\sqrt{\frac{1}{3}}(\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\uparrow\downarrow\right)$

$-\frac{1}{2}\sqrt{\frac{1}{3}}(\frac{\sqrt{3}}{2}\uparrow\uparrow\uparrow\downarrow-\frac{1}{2}\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\downarrow\uparrow$

$-\frac{1}{2}\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}}(\uparrow\uparrow\downarrow\downarrow+\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow-\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow+\downarrow\downarrow\uparrow\uparrow)\uparrow\uparrow$.

1	2	3	6
4	5		

1+1. $\sqrt{\frac{2}{3}}\frac{\sqrt{3}}{2}\uparrow\uparrow\uparrow\downarrow\downarrow\uparrow-\sqrt{\frac{2}{3}}\frac{1}{2}\sqrt{\frac{1}{3}}(\uparrow\uparrow\downarrow\uparrow+\uparrow\downarrow\uparrow\uparrow+\downarrow\uparrow\uparrow\uparrow)\downarrow\uparrow$.

$-\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}}(\uparrow\uparrow\downarrow\downarrow+\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)\uparrow\uparrow$.

$+\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}}(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow+\downarrow\downarrow\uparrow\uparrow)\uparrow\uparrow$.

⑨

1	2	3
4	5	6

0 0 $\sqrt{\frac{1}{2}}\sqrt{\frac{2}{3}}\frac{\sqrt{3}}{2}\uparrow\uparrow\uparrow\downarrow\downarrow\downarrow - \sqrt{\frac{2}{3}}\frac{1}{2}\sqrt{\frac{1}{3}}(\uparrow\uparrow\downarrow\uparrow + \uparrow\downarrow\uparrow\uparrow + \downarrow\uparrow\uparrow\uparrow)\downarrow\downarrow$

$\sqrt{\frac{1}{2}}(-\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}})(\uparrow\uparrow\downarrow\downarrow + \uparrow\downarrow\uparrow\downarrow + \downarrow\uparrow\uparrow\downarrow)\uparrow\downarrow$

$\sqrt{\frac{1}{2}}\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}}(\uparrow\downarrow\downarrow\uparrow + \downarrow\uparrow\downarrow\uparrow + \downarrow\downarrow\uparrow\uparrow)\uparrow\downarrow$.

$(-\sqrt{\frac{1}{2}})\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}}(\uparrow\uparrow\downarrow\downarrow + \uparrow\downarrow\uparrow\downarrow + \downarrow\uparrow\uparrow\downarrow)\downarrow\uparrow$

$(-\sqrt{\frac{1}{2}})(-\sqrt{\frac{1}{3}}\sqrt{\frac{1}{6}})(\uparrow\downarrow\downarrow\uparrow + \downarrow\uparrow\downarrow\uparrow + \downarrow\downarrow\uparrow\uparrow)\downarrow\uparrow$.

$(-\sqrt{\frac{1}{2}})(-\sqrt{\frac{2}{3}}\frac{1}{2}\sqrt{\frac{1}{3}})(\uparrow\downarrow\downarrow\downarrow + \downarrow\uparrow\downarrow\downarrow + \downarrow\downarrow\uparrow\downarrow)\uparrow\uparrow$.

$(-\sqrt{\frac{1}{2}})(-\sqrt{\frac{2}{3}} - \frac{\sqrt{3}}{2})\downarrow\downarrow\downarrow\uparrow\uparrow\uparrow$.

1	2	4	5	6
3				

2 +2 $\sqrt{\frac{3}{3}}\uparrow\uparrow\downarrow\uparrow\uparrow\uparrow - \sqrt{\frac{1}{6}}(\uparrow\downarrow\uparrow\uparrow\uparrow + \downarrow\uparrow\uparrow\uparrow\uparrow)\uparrow$

1	2	4	5
3	6		

1 +1. $\sqrt{\frac{3}{4}}[\sqrt{\frac{3}{3}}\uparrow\uparrow\downarrow\uparrow\uparrow - \sqrt{\frac{1}{6}}(\uparrow\downarrow\uparrow\uparrow\uparrow + \downarrow\uparrow\uparrow\uparrow\uparrow)]\downarrow$

$-\frac{1}{2}\sqrt{\frac{2}{3}}[\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow - \sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow + \downarrow\uparrow\uparrow\downarrow) + \sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow + \downarrow\uparrow\downarrow\uparrow)$

$-\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow]\uparrow\uparrow$

$-\frac{1}{2}\sqrt{\frac{1}{3}}(\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow\uparrow - \sqrt{\frac{1}{6}}\uparrow\downarrow\uparrow\uparrow - \sqrt{\frac{1}{6}}\downarrow\uparrow\uparrow\uparrow)\downarrow\uparrow$

⑩

1	2	4	6
3	5		

$1+1.\ \sqrt{\frac{2}{3}}\left(\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow\uparrow-\sqrt{\frac{1}{6}}\uparrow\downarrow\uparrow\uparrow-\sqrt{\frac{1}{6}}\downarrow\uparrow\uparrow\uparrow\right)\downarrow\uparrow$

$-\sqrt{\frac{1}{3}}\left[\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{1}{12}}\left(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow\right)+\sqrt{\frac{1}{12}}\left(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow\right)\right.$

$\left.-\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\right]\uparrow\uparrow.$

1	2	4
3	5	6

$0+0\ \sqrt{\frac{1}{2}}\left[\sqrt{\frac{2}{3}}\left(\sqrt{\frac{2}{3}}\uparrow\uparrow\downarrow\uparrow-\sqrt{\frac{1}{6}}\uparrow\downarrow\uparrow\uparrow-\sqrt{\frac{1}{6}}\downarrow\uparrow\uparrow\uparrow\right)\downarrow\right]\downarrow$

$\left(\sqrt{\frac{1}{2}}\right)\left(-\sqrt{\frac{1}{3}}\right)\left[\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{1}{12}}\left(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow\right)\right.$

$\left.+\sqrt{\frac{1}{12}}\left(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow\right)-\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\right]\uparrow\downarrow.$

$\left(-\sqrt{\frac{1}{2}}\sqrt{\frac{1}{3}}\right)\left[\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow-\sqrt{\frac{1}{12}}\left(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow\right)\right.$

$\left.+\sqrt{\frac{1}{12}}\left(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow\right)-\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\right]\downarrow\uparrow.$

$\left(-\sqrt{\frac{1}{2}}\right)\left(-\sqrt{\frac{2}{3}}\right)\left[\sqrt{\frac{1}{6}}\left(\uparrow\downarrow\downarrow\downarrow+\downarrow\uparrow\downarrow\downarrow\right)-\sqrt{\frac{2}{3}}\downarrow\downarrow\uparrow\downarrow\right]\uparrow\uparrow.$

⑪

1	2	5	6
3	4		

$1+1.\ \sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow\uparrow\uparrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)\uparrow\uparrow$

$-\sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow)\uparrow\uparrow+\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\uparrow\uparrow$

1	2	5
3	4	6

$0+0\ \sqrt{\frac{1}{2}}[\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow\uparrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)\uparrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow)\uparrow$

$+\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\uparrow]\downarrow$

$-\sqrt{\frac{1}{2}}[\sqrt{\frac{1}{3}}\uparrow\uparrow\downarrow\downarrow\downarrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow+\downarrow\uparrow\uparrow\downarrow)\downarrow-\sqrt{\frac{1}{12}}(\uparrow\downarrow\downarrow\uparrow+\downarrow\uparrow\downarrow\uparrow)\downarrow$

$+\sqrt{\frac{1}{3}}\downarrow\downarrow\uparrow\uparrow\downarrow]\uparrow$

1	3	4	5	6
2				

$2+2\ \sqrt{\frac{1}{2}}(\uparrow\downarrow\uparrow\uparrow-\downarrow\uparrow\uparrow\uparrow)\uparrow\uparrow$

1	3	4	5
2	6		

$1+1.\ \sqrt{\frac{3}{4}}\sqrt{\frac{1}{2}}(\uparrow\downarrow\uparrow\uparrow-\downarrow\uparrow\uparrow\uparrow)\uparrow\downarrow$

$-\sqrt{\frac{1}{4}}[\sqrt{\frac{1}{6}}(\uparrow\downarrow\uparrow\uparrow-\downarrow\uparrow\uparrow\uparrow)\downarrow+\sqrt{\frac{1}{6}}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)$

$\uparrow]\uparrow$

(12)

1	3	4	6
2	5		

$|+|\ \sqrt{\frac{1}{3}}(\uparrow\downarrow\uparrow\uparrow-\downarrow\uparrow\uparrow\uparrow)\downarrow\uparrow$

$-\sqrt{\frac{1}{12}}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)\uparrow\uparrow$

1	3	4
2	5	6

$0+0\ \sqrt{\frac{1}{2}}\sqrt{\frac{1}{3}}(\uparrow\downarrow\uparrow\uparrow-\downarrow\uparrow\uparrow\uparrow)\downarrow\downarrow$

$\sqrt{\frac{1}{2}}(-\sqrt{\frac{1}{12}})(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)\uparrow\downarrow$

$(-\sqrt{\frac{1}{2}})(\sqrt{\frac{1}{12}})(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow+\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)\downarrow\uparrow$

$(-\sqrt{\frac{1}{2}})(-\sqrt{\frac{1}{3}})(\uparrow\downarrow\downarrow\downarrow-\downarrow\uparrow\downarrow\downarrow)\uparrow\uparrow$

1	3	5	6
2	4		

$|+|\ [\frac{1}{2}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow)-\frac{1}{2}(\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)]\uparrow\uparrow$

1	3	5
2	4	6

$0\ 0\ \sqrt{\frac{1}{2}}[\frac{1}{2}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow)-\frac{1}{2}(\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)]\uparrow\downarrow$

$-\sqrt{\frac{1}{2}}[\frac{1}{2}(\uparrow\downarrow\uparrow\downarrow-\downarrow\uparrow\uparrow\downarrow)-\frac{1}{2}(\uparrow\downarrow\downarrow\uparrow-\downarrow\uparrow\downarrow\uparrow)]\downarrow\uparrow$