



Five vs. Four & Six

From the study of Four vs. Six it became clear that there was no real justification in building a six-sheet rink instead of a four-sheet rink, except if the decision was political or based on other information not considered. The primary reason was the amount of additional work involved to maintain the ice to specification, and the change-over period between peak sessions. Without extra staff on duty to speed up the work there was simply not sufficient time or energy, and with the extra help the costs rose more than the income. The six-sheet rink would simply not be as cost-effective a facility as the four-sheet rink, and it would be extremely difficult to run properly.

Strangely, since the report was published on the web, there was a barrage of comment in favour of the six-sheet rink, without a shred of evidence. Many said that it would make more money, was more cost effective to run and "why was everyone building six-sheet rinks" – our reply was simply that the analysis of Four vs. Six was performed to investigate the very question, and the result really speaks for itself.

The fact remains that psychology holds more sway than fact – if people believe a six-sheet rink is better than a four-sheet rink, no amount of evidence will change their minds. Furthermore, compromise is always the best way to deal with psychology, and if a good compromise can be found it must be taken seriously by both sides. As a consequence this report will look specifically at the options and problems presented by a five-sheet rink, perhaps not a conventional size but widely in evidence in virtually all flip-over rinks, using much the same material and methods of the Four vs. Six analysis.

From the practical point of view the difference between the four and five will not be as great as that between the four and six. The building will be five metres wider, an additional 25% of floor space in the ice hall, with the gallery, club room and restaurant all wider by the same 25% to deal with additional visitors. It is very easy too to increase the size of the changing rooms, while nothing else will be affected. As it is a new building the plant and equipment too can be sized to suit with relatively little additional costs, unlike the big change to run an additional 50% of floor space in a six-sheet rink.

In the table below a comparison is made between the three rinks, assuming that all three will have five sessions a day, made possible by adjusting the scheduled times a little to allow for the necessary work. The minimum is a realistic estimate of what the usage will be, the maximum is as much as it could be, and the average is between the two. The figures are units of curling, i.e. player per game, in sessions per day on average through the season. The Session % below is the increase from including the additional fifth peak session, while the Sheet % indicates the increase from adding an extra sheet of ice.

	4 sheets			5 sheets			6 sheets		
	Min	Ave	Max	Min	Ave	Max	Min	Ave	Max
1000							16	24	32
1030	16	24	32	16	24	32			
1230							16	24	32
1300	16	24	32	16	24	32			
1600							32	40	48
1630	16	24	32	16	28	40			
1830							32	40	48
1845	32	32	32	32	36	40			
2100	32	32	32	32	36	40	32	40	48
	112	136	160	112	148	184	128	168	208
Session %	21.4 28.5			25 35.7			31.3 37.5		
Sheet %				15			30		

Using the maximum figures, it is clear that the units have only increased by 15%, although the floor space has increased by 25%. This is because the usage is only relevant to the peak sessions, while the daytime sessions will remain undersubscribed. The additional peak session on the five increases the units by 35%, a much healthier situation indicating that there is something to gain, and with the 1630 start it will be possible to fill all five sheets. From the Four vs. Six study it was obvious that the same could not be achieved in a six-sheet rink due to the amount of work required and the same increase in usage cannot in reality be achieved – filling six sheets at 1600 will also be near impossible.

In the next table the units are calculated over the year for each of the three rinks, using the figures from above. The top table uses the average units and the bottom table uses the maximum.

	4	5	6	Sheet	Session
AVE				2 peak	5 ave
Day	136	148	168	16	40
Week	952	1036	1176	112	280
35 weeks	33320	36260	41160	3920	9800
Players	1904	2072	2352	224	560
%		8.8	23.5	10.8	25
MAX					
Day	160	184	208		
Week	1120	1288	1456		
35 weeks	39200	45080	50960		
Players	2240	2576	2912		
%		15	30	10.8	35.7

Although an extra sheet for the five has increased the area by 25%, it has only increased the units by 8.8% and by 15% maximum. Adding one sheet for peak use to allow two extra sessions on that sheet only increases the units by 10.8%, while the addition of an extra session in the five-sheet rink will increase the units by 25% for the average and 35.7% for the maximum figures. This emphasises that there is much more to gain by having the extra session at 1630 than by adding an extra sheet or even two sheets, while an extra session on the six will be impossible. Looking at the number of players, who will be able to curl once every two weeks on average, the four will cater for some 1900 players running the five sessions, and as many as 2240 if the peak sessions are fully subscribed. The five will cater for 2072 players and possibly 2576. At a rate of £10 a game this means that the five-sheet rink can generate an additional £30k and, if full, even £50k, which makes serious business sense. The ice technicians who will have to work so much harder to maintain the ice will certainly be able to earn more for their efforts.

How does this work? The figures can and will seem confusing, as will the fact that a five-sheet rink makes more sense than a six-sheet rink. It is all down to the workload and what is achievable in a given space of time by the ice technicians. By running the five as a four during the daytime sessions, therefore only having to prepare four sheets, the fifth can be prepared earlier in the afternoon and so not interfere with the second cut for the four sheets. The same cannot be done for the six sheeter because there will not be enough time, and the introduction of an extra ice technician on duty will not be able to change that even if the extra cost can be justified.

The same number of ice technicians needed to run the four can run the five without changing the schedule. This can generate substantial additional revenue as well as space for additional members of the club. It is very clear from these figures that a five-sheet rink retains all the advantages of the four, without gaining any of the disadvantages of the six. For an area that can provide **sufficient members to use 45,000 units of curling** in a thirty-five week season, the five-sheet rink is an excellent option. Other advantages include visual enhancement, especially for the middle sheet, and a superior balance of conditions within which to play a final of a competition.