DECONSTRUCTING THE GAMES

SKI JUMPING: Six seconds to perfection

There's a method to the madness of flying up to 150 metres in the air, on nothing but a pair of skis. Canwest News Service writer **Rob Vanstone** explains:

Learning to fly

Ski jumping has been part of the Winter Olympics since the Games' inception in 1924. The sport featured one hill, the normal hill, for all Olympics from 1924 to 1960. The large hill was added in 1964. There is also a team event, in addition to individual competition on both hills. Here's a look at how the sport works:

1.THE PREP

The jump begins at the top of the in run, or ramp. Skiers reach the top of the tower, also known as the scaffold, via elevator. There are multiple starting gates. Officials determine, with the help of a trial round, which gate will be used for competition.The goals are to keep the speed within a narrow range while maximizing the jumpers' distance and safety.

2.INRUN

The ski jumper descends down the ramp at a speed approaching 95 km/h. The goal is to gain speed while maintaining control. The jumper makes the descent in a crouch, with shins angled far forward, the chest compressed against the thighs, and arms back and held close to the body.The takeoff slopes downward at about 35 degrees.

3.TAKEOFF

The ski jumper takes off while simultaneously leaping forward and upward. Most jumpers position their skis in a large V (as opposed to parallel to one another, as was the custom well into the 1980s) to gain additional lift and distance. **4. FLIGHT** A typical flight lasts four to six seconds.

5.LANDING

At landing, the skis should be no further than a ski-width apart (in the telemark position), with knees bent and one ski slightly ahead of the other. Jumpers are judged according to distance and technical precision.

SMART FACTS

1.THE K POINT

This is the "par" distance, the spot at which points are added for every metre the jumper flies beyond K, or deducted for landing shy of the K. Judges also award points for technique.

2. GOING THE DISTANCE

At Whistler, skiers can achieve distances approaching 150 metres from the large hill and in excess of 100 metres from the normal hill.

3. EURO CRAZE

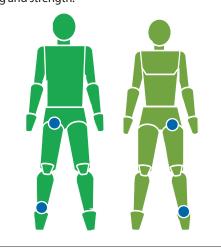
The sport is immensely popular in Europe, attracting crowds of 80,000 to 100,000, along with prime-time TV audiences. Top jumpers have an annual income approaching \$1 million, once endorsements and prize money are considered.

4. THE GENDER BARRIER

Ski jumping is one of a minority of Olympic sports that excludes athletes of one gender. Female jumpers appealed to the International Olympic Committee for inclusion in the 2010 Games, but their attempts were unsuccessful. The IOC contends there aren't enough wornen in ski jumping, and not enough world championships were held in the leadup to the Games. The ski-jumping community countered by arguing that more women are involved in that sport than in ski-cross, which made the 2010 roster.

THE ATHLETES

A lean physique is optimal for ski jumpers. The goal is to have explosive power in the legs, without an abundance of bulk in the upper body. The fine line for ski jumpers is to build muscle in the legs without becoming bulky. Heavier athletes focus on endurance exercises with designs on weight control. Lighter jumpers will concentrate on toning and strength.



MEDAL FAVOURITES



MANDAL DE MANUEL

Simon Ammann, Switzerland

The good: In 2002, Ammann became only the second person to win individual gold medals in the normal and large hill events at the same Olympics — matching the 1988 feat by Finland's Matti Nykanen. **The bad:** Finished seventh on the large hill and tied for 38th on the normal hill at Turin in 2006.

Gregor Schlierenzauer, Austria

The good: Finished first overall in the World Cup standings in 2009 with 2,083 points, 297 more than second-place Ammann. **The bad:** At 19, Schlierenzauer lacks Olympic seasoning. Who knows how he'll handle the pressure in Whistler?

Wolfgang Loitzl, Austria

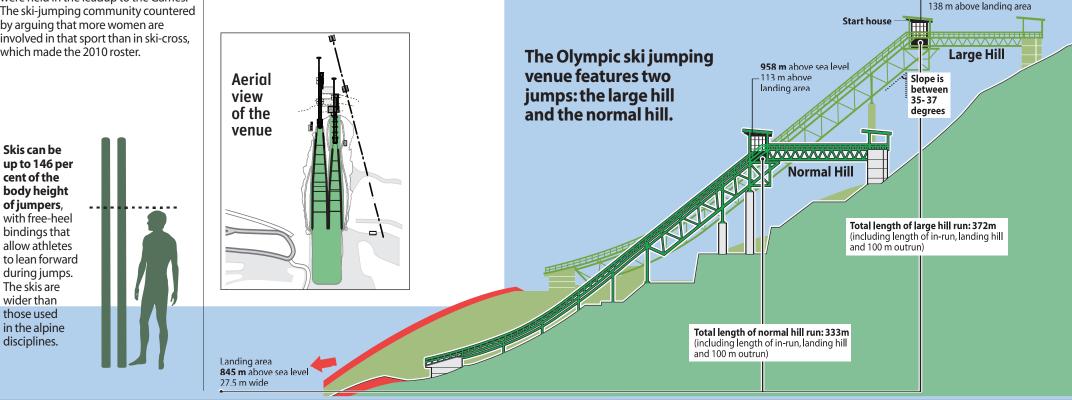
The good: Finished third overall in the World Cup standings in 2009, when he reached the top echelon for the first time.

The bad: Loitzl is known more for consistency than for blowing everyone away, so his upside may be limited.



THE VENUE

Whistler Olympic Park can accommodate 12,000 spectators for ski jumping. The complex, which opened on Nov. 22, 2008, also will be used for biathlon, cross-country skiing and Nordic combined (which combines cross-country skiing and ski jumping). It's the first facility in Olympic history to include all three Nordic sport stadiums in one site.



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GRAPHICS: BY ROGER WATANABE AND MAGGIE WONG/VANCOUVER SUN

983 m above sea level

SKI JUMPING SCHEDULE

» Day 1 Friday, Feb. 12 Men's individual normal hill 10-11:05 a.m.

» Day 2 Saturday, Feb. 13 Men's individual normal hill *9:45-11:25 a.m. » Day 8 Friday, Feb. 19 Men's individual large hill 10-11:05 a.m.

» Day 9 Saturday, Feb. 20 Men's individual large hill *11:30-1:10 p.m. » Day 11 Monday, Feb. 22 *Men's team large hill 10-11:55 a.m.

10 11.55 d.m.

* Indicates medal event



Whistler Sliding Centre

The jumps were supposed to be built for summer use in addition to winter use, but were scaled back for winter-use only.

Alta Lake

Meadow Park

Community

Centre