

**Osmundaceae (Royal Fern Family) Key**  
**Key to species in Newfoundland and Labrador**  
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- 1a. Fronds dimorphic, with completely separate sterile and fertile fronds; fertile fronds long and narrow, erect, densely covered with a woolly layer of cinnamon brown hairs, withering to the ground after spores are shed; sterile fronds pinnate-pinnatifid. ....  
..... ***Osmundastrum cinnamomeum*** (cinnamon fern)
- 1b. Fertile fronds with dimorphic pinnae, sterile and fertile pinnae occurring on the same frond; fertile fronds or pinnae not densely covered with woolly hairs; sterile fronds pinnate-pinnatifid or bipinnate. .... **2**
- 2a. Fronds pinnate-pinnatifid, with 2–5 pairs of fertile pinnae in the middle of the frond, these soon withering and dropping after spores are shed, leaving a gap in the frond; sterile pinnae narrowly lanceolate, pinnatifid. ....  
..... ***Claytosmunda claytoniana*** (interrupted fern)
- 2b. Fronds bipinnate, the terminal portion of the frond with several pairs of fertile pinnae, these soon withering after the spores are shed; the lower portion sterile, with lanceolate, entire short-stalked pinnules. ....  
..... ***Osmunda regalis* var. *spectabilis*** (royal fern)

## Osmundaceae Comparison Chart

Species:	<i>Osmundastrum cinnamomaeum</i>	<i>Claytosmunda claytoniana</i>	<i>Osmunda regalis</i> var. <i>spectabilis</i>
	cinnamon fern	interrupted fern	royal fern
<b>Sterile Fronds</b>	<b>pinnate-pinnatifid</b> , elliptic-oblong; to 1.2 m long	<b>pinnate-pinnatifid</b> , elliptic; to 1.2 m long	<b>bipinnate</b> , ovate; to 1.8 m long
<b>Shape of Pinnae or Pinnules on Sterile Fronds</b>	pinnae linear-lanceolate, pinnatifid, ultimate segments oblong, <b>obtuse to acute</b> ; each <b>pinnae with a tuft of white to cinnamon brown hairs at the base</b> , adjacent to the rachis	pinnae linear-lanceolate, pinnatifid, 13–18 cm long, ultimate segments oblong, <b>blunt</b> ; <b>woolly tufts of hairs lacking</b> at pinnae bases	<b>pinnules</b> linear-lanceolate, to 7 cm long, <b>very short-staked</b> , apex acute to rounded, base oblique to truncate, margins nearly entire at the base to <b>denticulate towards the apex</b>
<b>Fertile Fronds or Fertile Pinnae</b>	<b>fertile fronds</b> slightly shorter than sterile fronds, <b>with a woolly coat of rusty-brown hairs</b> ; fertile fronds withering to the ground after spores are shed	<b>2–5 pairs of fertile pinnae</b> in the <b>middle</b> of the frond; fertile pinnae withering and falling from the rachis after spores are shed, leaving a gap in the middle of the frond	<b>several pairs of fertile pinnae</b> occur at the <b>terminal</b> part of the frond