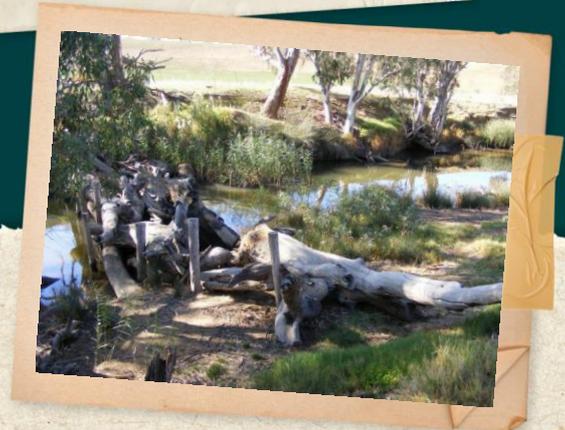


*Large woody habitat refers to trees, branches and limbs that fall into waterways and are conventionally defined as material with a diameter greater than 0.2m and a length greater than 1m.*

*Large woody habitat is naturally recruited from the riparian zone of waterways with the lower reaches of Victorian waterways generally containing more substantial quantities of large woody habitat than upper headwater reaches.*



## Values of large woody habitat

Reaching far beyond just habitat provision, large woody habitat provides a vast array of ecological services to waterways. It benefits include physical habitat diversity and structural complexity for aquatic organisms; refuge areas for fish to avoid predators, sunlight and high velocity water; spawning sites and territory markers; resting, perching, foraging lookout and crossing points for terrestrial fauna.

Large woody habitat provide hotspots for nutrient cycling, an area for algae, bacteria and fungi and invertebrates to live. It also stabilises the stream channel and bed sediment.

When water flows over large woody habitat it is reoxygenated, preventing stagnation and, in some cases, large woody habitat helps to provide floodplain inundation, allowing fish species to spawn and food from the floodplain to be washed into the stream.

Large woody habitat also has social and economic benefits such as: recreational fishing; natural and low cost maintenance of waterways; and an increase in the aesthetic value of waterways.

## Perceived threats to waterways

Concern regarding the accumulation of large woody habitat is largely centered on the perception that it increases flood frequency and severity, which may cause damage to land and infrastructure.

However, there is little evidence to support this notion, except where an accumulation is significant and oriented perpendicular to the water flow: Another misconception is that large woody habitat increases the risk to bridges, however native hardwood trees are heavy with complex branch systems and rarely transport downstream easily.

## Managing large woody habitat

In the distant past, extensive de-snagging programs were conducted due to perceived threats. As a result of persistent mechanical removal and clearance of riparian vegetation, the volume of large woody habitat has been depleted. The current management emphasis is to favour in-stream ecology by removing as little large woody habitat as possible. In cases where intervention is required, less intrusive methods are adopted.