

## Oyster thief, *Colpomenia peregrina*

### Overview

#### Short description of *Colpomenia peregrina*, Oyster thief

A nongelatinous olive-green coloured alga forming a thin-walled hollow sphere, occasionally over 20 cm in diameter but usually 3 – 9 cm. Young are brown and balloon-like, becoming yellow-brown, contorted and collapsed with age. The frond is papery and delicate; it is filled with seawater when young and hollow and empty when older.

#### Description of *Colpomenia peregrina*, Oyster thief status in GB

Occurs around most British coasts, with larger populations on western coasts and limited records from the east coast of England.

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#### Habitat summary: *Colpomenia peregrina*, Oyster thief

Found on rock, other seaweeds or shells, including commercially grown oysters, from early summer to late autumn. The oyster thief is usually epiphytic, growing on a variety of seaweeds in mid to lower shore rock pools and in the shallow subtidal region. It thrives in sheltered areas.

### Overview table

Environment:	Marine
Species status:	Non-Native
Native range:	Pacific
Functional type:	Algae (macroalgae)
Status in England:	Non-Native
Status in Scotland:	Non-Native
Status in Wales:	Non-Native
Location of first record:	Torquay and Swanage
Date of first record:	1907

### Invasion history: *Colpomenia peregrina*, Oyster thief

#### Origin

Native to the Pacific Ocean.

#### First Record

Introduced to Cornwall and Dorset from France in 1907.

#### Pathway and Method

The oyster thief was introduced to France from the USA with imports of oysters at the end of the nineteenth century. Natural spread from France to Britain has since occurred; it may also have been unintentionally introduced with commercial oyster imports.

#### Species Status

Following its initial occurrence in southern England in 1907, the oyster thief had spread

to the Orkneys by 1940. It is widespread in temperate coastal regions throughout the world.

## **Ecology & Habitat: *Colpomenia peregrina*, Oyster thief**

### **Dispersal Mechanisms**

Thalli are hollow, becoming air-filled and buoyant; this enables them to spread by floating on surface currents. Gametes released by the plant are dispersed in the water column before settling.

### **Reproduction**

This species is an annual and has a heteromorphic life history in which a sexual gametophytic form (the globose thallus) alternates with an asexual sporophytic form (a discoid thallus) bearing sporangia.

### **Known Predators/Herbivores**

This alga has a low nutritional content, but some marine herbivores including amphipods will consume the oyster thief.

### **Resistant Stages**

None known.

### **Habitat Occupied in GB**

Occurs in mid to lower shore rock pools and shallow subtidal waters, attached to other seaweed, shells or rock.

## **Distribution: *Colpomenia peregrina*, Oyster thief**

Native to the Pacific Ocean. In Britain it can be found on most coasts, with larger populations in the south west.

## **Impacts: *Colpomenia peregrina*, Oyster thief**

### **Environmental Impact**

May have the potential to smother species or cover areas of the shore, but no significant impacts have been reported on native species.

### **Health and Social Impact**

None known.

### **Economic Impact**

When undamaged, the oyster thief can become air filled and buoyant, floating away with oysters to which it is attached. During the early twentieth century economic losses were reported from French oyster beds but no recent economic impacts have been recorded.

## **References & Links: *Colpomenia peregrina*, Oyster thief**

### **Identification**

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### **Biology, ecology, spread, vectors**

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*peregrina* (Scytosiphonales, Rhodophyta) from Japan. *Phycologia*, **36**, 331-344

Lobban, C.S. & Wynne, M.J. (Eds) (1981) *The biology of seaweeds. Botanical Monographs Volume 17*. Blackwell Scientific Publications, Oxford.

#### **Management and impact**

Farnham, W.F. (1980) Studies on Aliens in the Marine Flora of Southern England. In: Price, J.J., Irvine, D.E.G. & Farnham, W.F. (Editors) (1980) *The Shore Environment*, Volume 2: Ecosystems, pp. 875 – 914. Academic Press, London & New York

#### **General**

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