## NAME

wlan\_ccmp - AES-CCMP crypto support for 802.11 devices

### SYNOPSIS

device wlan\_ccmp

# DESCRIPTION

The **wlan\_ccmp** module handles the AES-CCMP cryptographic requirements of the WPA and 802.11i protocols. It does encapsulation and decapsulation of CCMP-encoded 802.11 frames and optionally calculates the AES-CCMP cipher. The **wlan\_ccmp** module is an 802.11 cryptographic plugin module for use by the wlan(4) module. This module is automatically loaded if an AES-CCMP key is configured; typically by a WPA supplicant program such as wpa\_supplicant, or a WPA authenticator program such as **hostapd**. Should the underlying network device not be capable of doing the AES-CCMP calculations in hardware, the **wlan\_ccmp** module will do the work.

# SEE ALSO

wlan(4), wlan\_tkip(4), wlan\_wep(4)

## **STANDARDS**

More information can be found in the IEEE 802.11, WPA, and 802.11i Standards.

## HISTORY

The **wlan\_ccmp** driver first appeared in FreeBSD 6.0.