

NAME

OF_device_from_xref, **OF_xref_from_device**, **OF_device_register_xref** - manage mappings between xrefs and devices

SYNOPSIS

```
#include <dev/ofw/ofw_bus.h>
#include <dev/ofw/ofw_bus_subr.h>
```

int

```
OF_device_register_xref(phandle_t xref, device_t dev);
```

device_t

```
OF_device_from_xref(phandle_t xref);
```

phandle_t

```
OF_xref_from_device(device_t dev);
```

DESCRIPTION

When a device tree node references another node, the driver may need to get a *device_t* instance associated with the referenced node. For instance, an Ethernet driver accessing a PHY device. To make this possible, the kernel maintains a table that maps effective handles to *device_t* instances.

OF_device_register_xref() adds a map entry from the effective phandle *xref* to device *dev*. If a mapping entry for *xref* already exists, it is replaced with the new one. The function always returns 0.

OF_device_from_xref() returns a *device_t* instance associated with the effective phandle *xref*. If no such mapping exists, the function returns NULL.

OF_xref_from_device() returns the effective phandle associated with the device *dev*. If no such mapping exists, the function returns 0.

EXAMPLES

```
static int
acmephy_attach(device_t dev)
{
    phandle_t node;

    /* PHY node is referenced from eth device, register it */
    node = ofw_bus_get_node(dev);
    OF_device_register_xref(OF_xref_from_node(node), dev);
}
```

```
    return (0);  
}
```

SEE ALSO

OF_node_to_xref(9)

AUTHORS

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