NAME

set − CHSM set class

SYNOPSIS

```
#define CHSM_SET_ARGS   /* ... */
#define CHSM_SET_INIT   /* ... */

namespace Concurrent_Hierarchical_State_Machine {

    class set : public parent {
    public:
        set( CHSM_SET_ARGS );

        // inherited

        typedef state value_type;
        typedef value_type* pointer;
        typedef value_type const* const_pointer;
        typedef value_type& reference;
        typedef value_type const& const_reference;

        class iterator;
        class const_iterator;

        bool active() const;
        iterator begin();
        const_iterator begin() const;
        virtual void deep_clear();
        bool empty() const;
        iterator end();
        const_iterator end() const;
        virtual bool enter( event const &trigger, state* = 0 );
        virtual bool exit ( event const &trigger, state* = 0 );
        reference front();
        const_reference front() const;
        char const* name() const;
        parent* parent_of() const;
    };

}
```

DESCRIPTION

A `set` *is-a* **CHSM::parent**(3) that represents a logical-and grouping where all of its child states are active concurrently. All child-states are entered after and exited before their parent-state. The order that child-states are entered and exited is undefined.

SEE ALSO

CHSM::cluster(3), **CHSM::parent**(3), **CHSM::state**(3), **chsm-c++**(4)

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