state

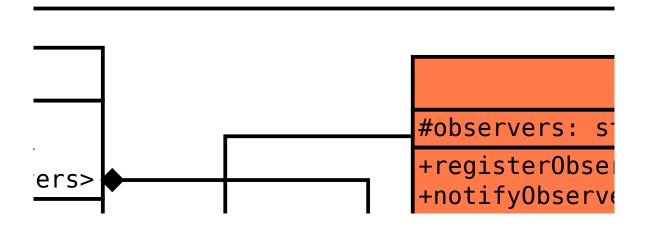


GameStates

#turn: int

#cardList: std::vector<Cards>
#playerList: std::vector<Play</pre>

· C - - - C + - + - - / \

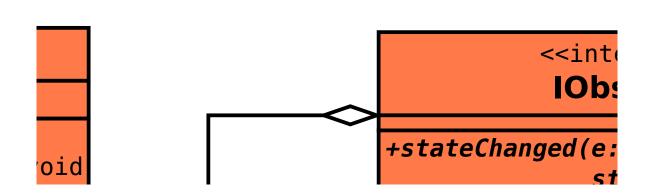


Observable

td::vector<I0bserver*>

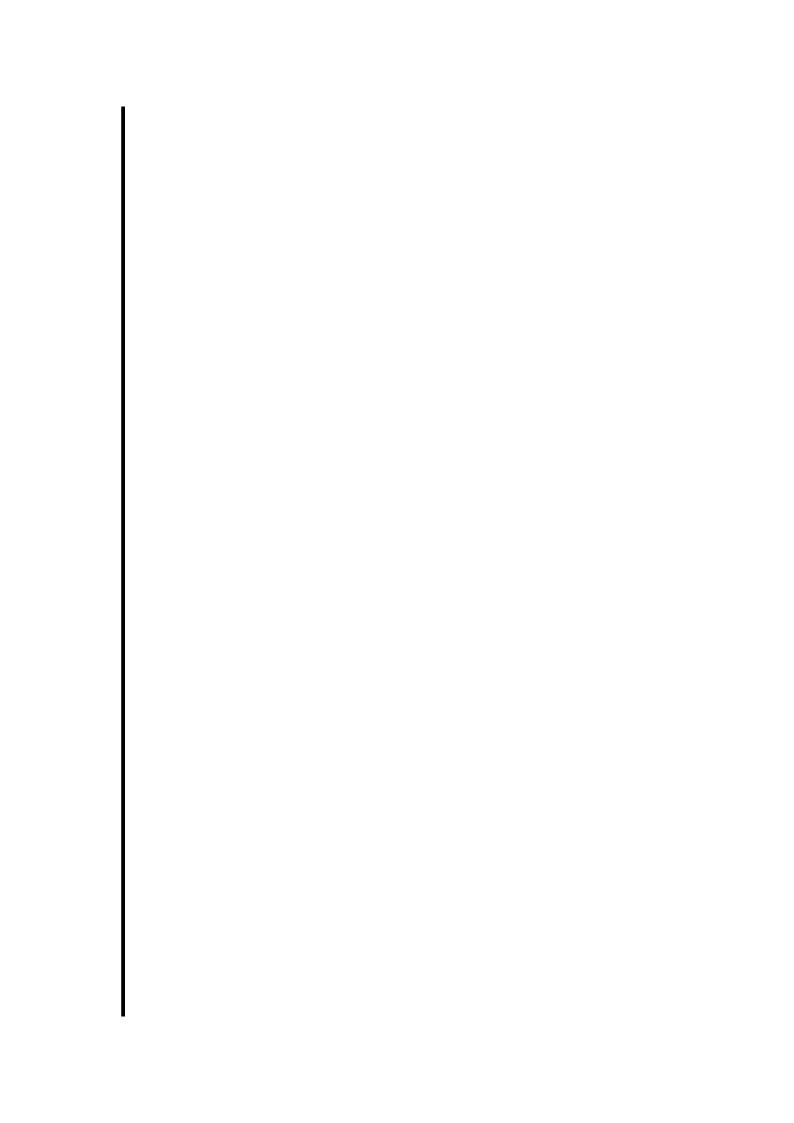
rver(observer:I0bserver*): void

ers(e:const StateEvent&,state:State&): v



erface>> **server**

const StateEvent&,
rate:State&): void



```
#lifePointsPlamus #lifePointsPlamus #attackPoints #attackPoints #defensePoints #defensePoints #calculation (**

+Calculation (***

+~Calculation (***)
```

Calculation

```
ayer1: int
ayer2: int
Player1: int
Player2: int
sPlayer1: int
sPlayer2: int
```

lifePointsPlayer1:int,lifePointsPlayer2:
attackPointsPlayer1:int,attackPointsPlay
defensePointsPlayer1:int,defensePointsPl
()

int,
rer2:int,
ayer2:int)

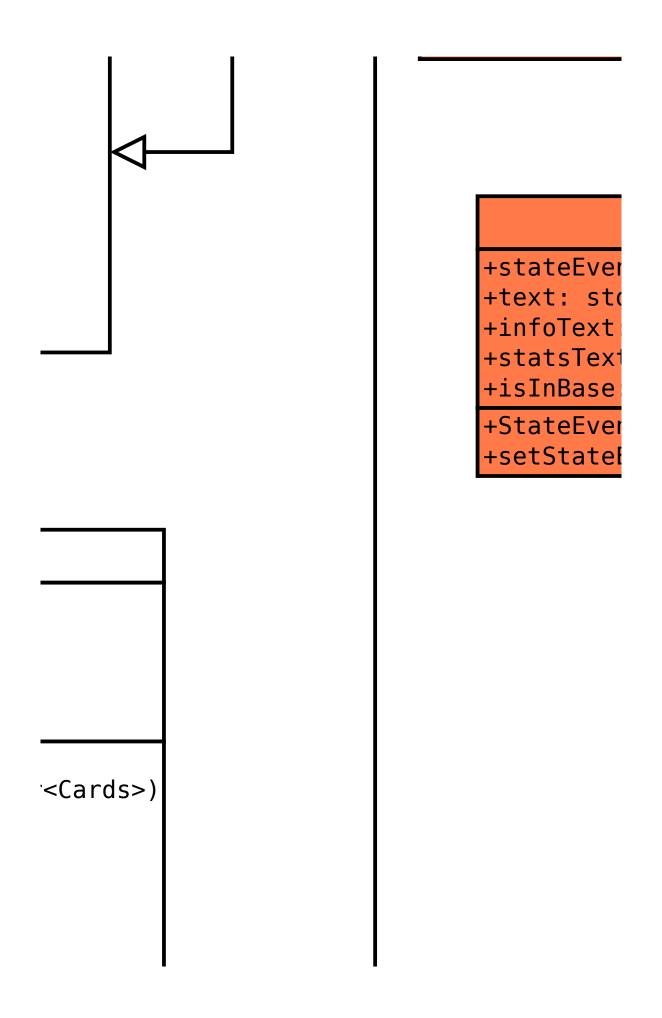
```
#id: int
#monsters: std::vector
#spells: std::vector<
#traps: std::vector<
#graveyard: std::vect
+Boards(spells:std::vect)
+Boards()
+~Boards()
+attackPosition(): voud
+addMonster(): void</pre>
```

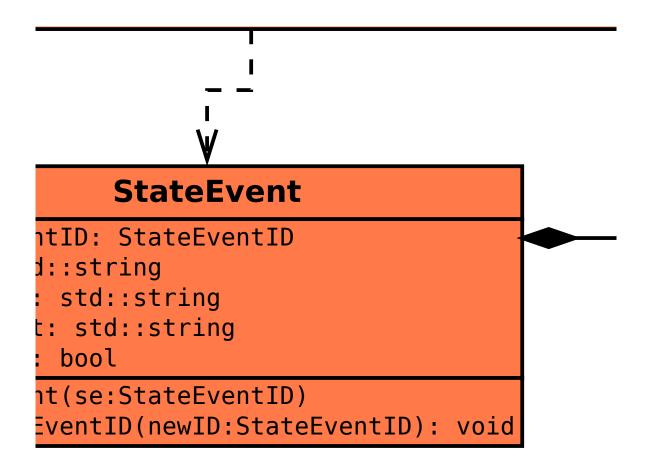
```
+GameStates()
+~GameStates()
+init(): void
+incrementTurn(): void
+displayScore(): void
+addPlayer(): void
+addBot(): void
+deletePlayer(): void
+createPlayer(): void
+deleteBot(): void
```

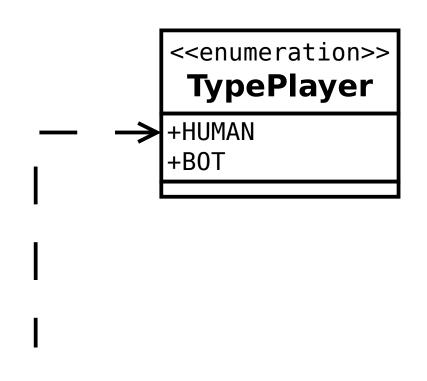
Boards

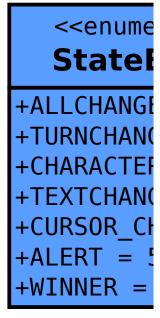
```
or<Monsters>
<Spells>
Traps>
tor<Cards>
vector<Spells>,traps:std::vector<Traps>,
::vector<Monsters>,graveyard:std::vector
bic
```

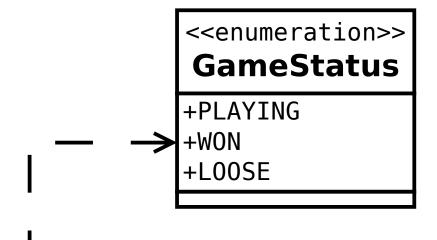
void √





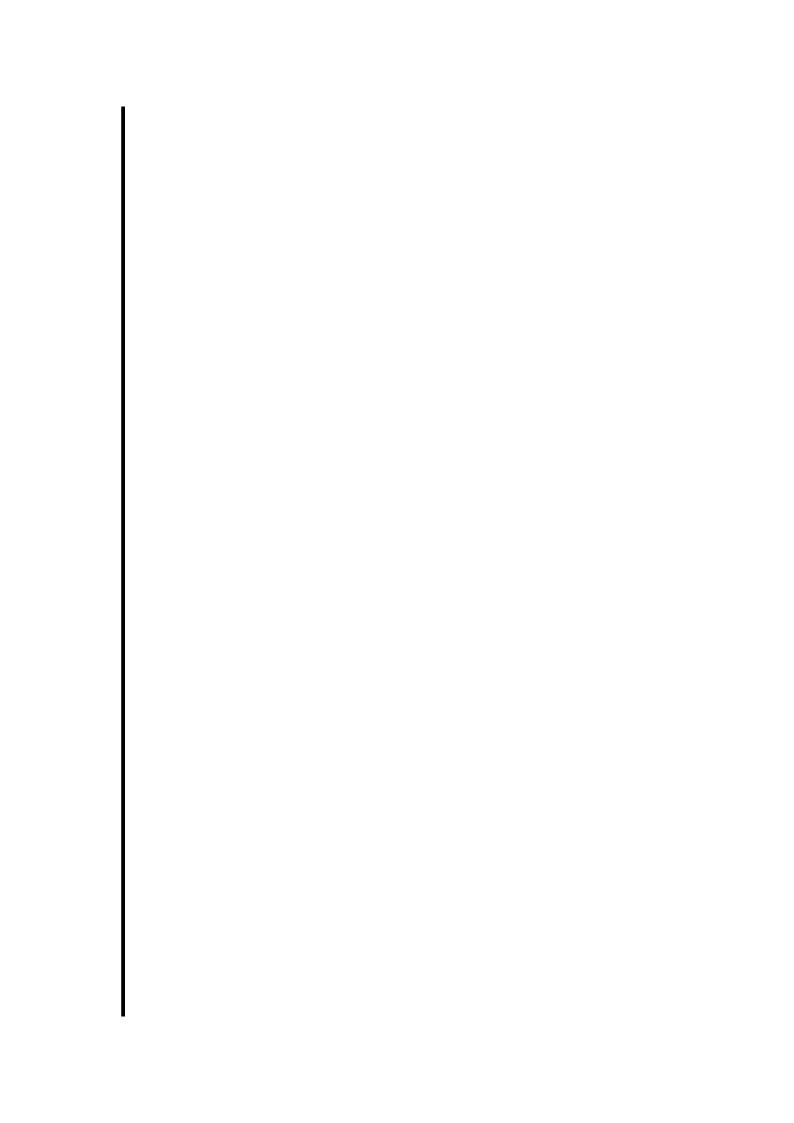






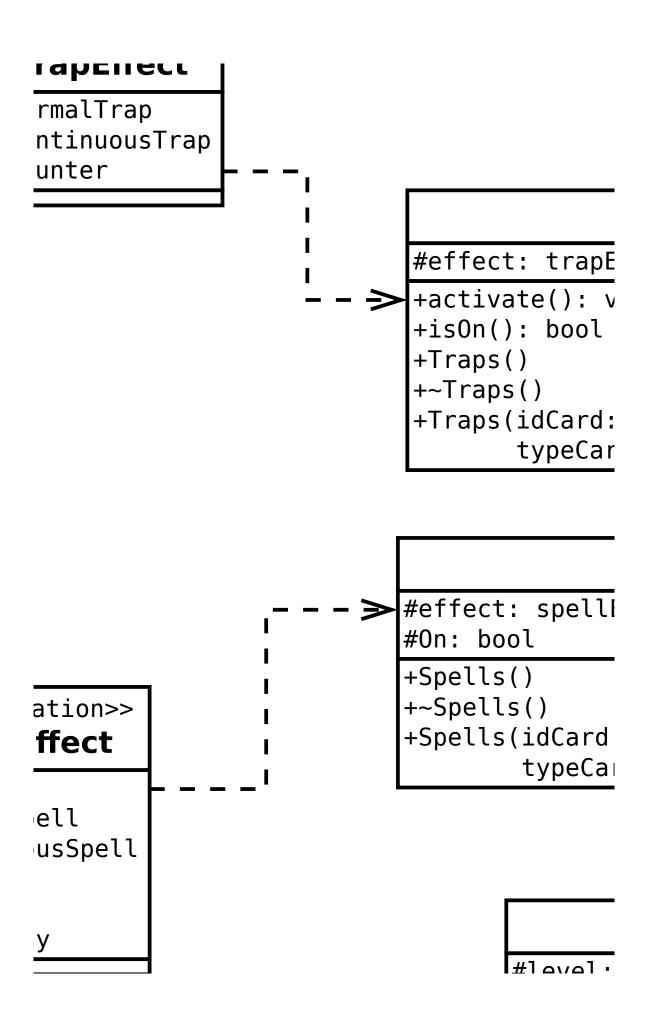
```
eration>>
EventID

ED: 0
GED: 1
RCHANGED: 2
GED: 3
HANGED = 4
D
6
```



<<enumerates spellE</pre>

- +Ritual
- +NormalSp
- +Continuo
- +Field
- +Equiped
- +Quickpla



Traps

:ffect

'oid

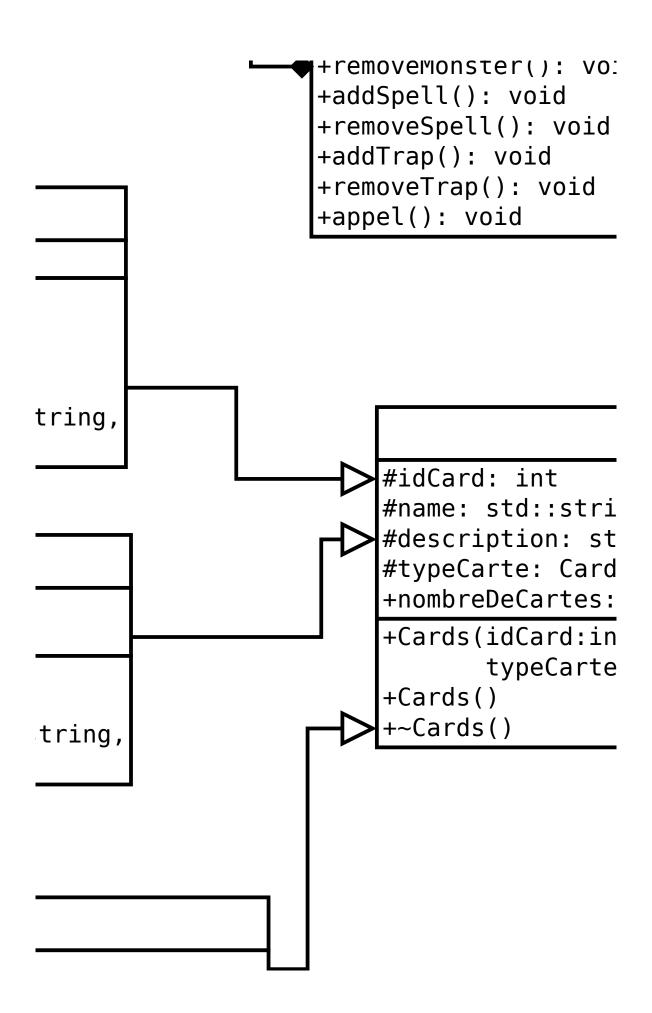
int,name:std::string,description:std::s
te:CardTypes,effect:trapEffect)

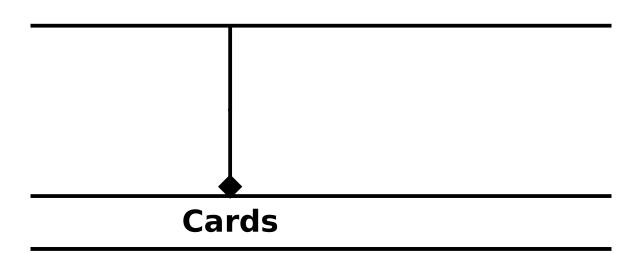
Spells

Effect

:int,name:std::string,description:std::s
rte:CardTypes,effect:spellEffect)

Monsters





ng

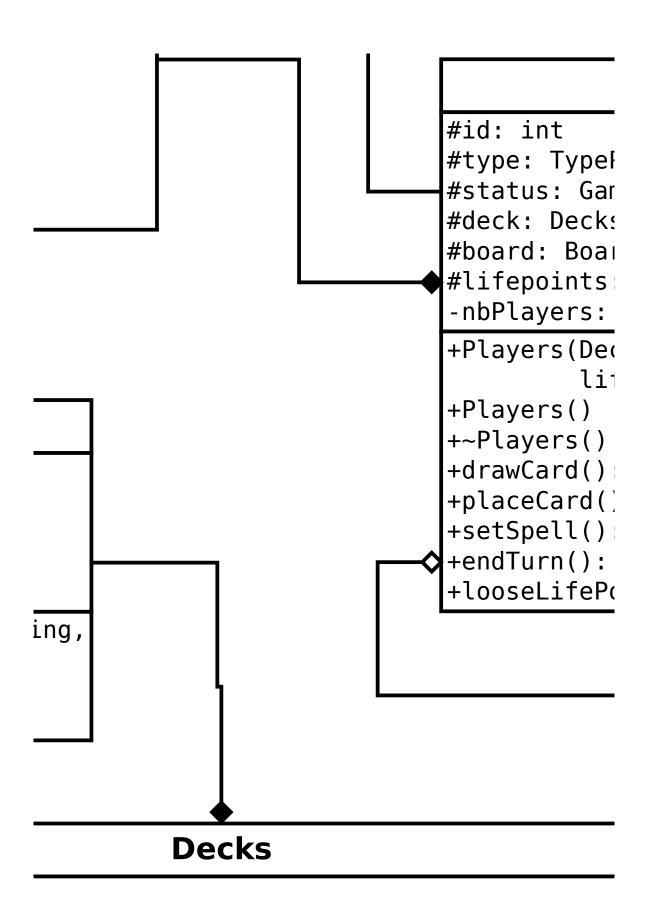
d::string

Types int

t,name:std::string,description:std::str:
:CardTypes)

#id: int

#cardsInDeck: std::vec
#cardsInHand: std::vec



tor<Cards>
tor<Cards>

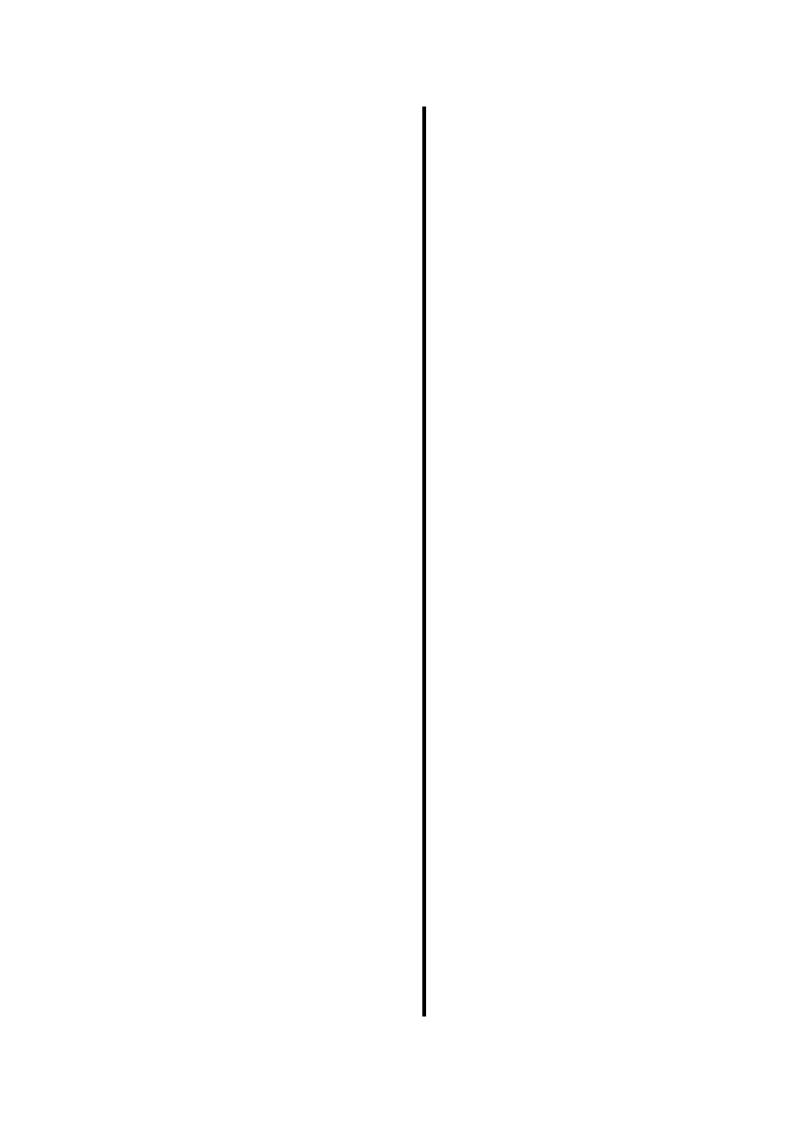
Players

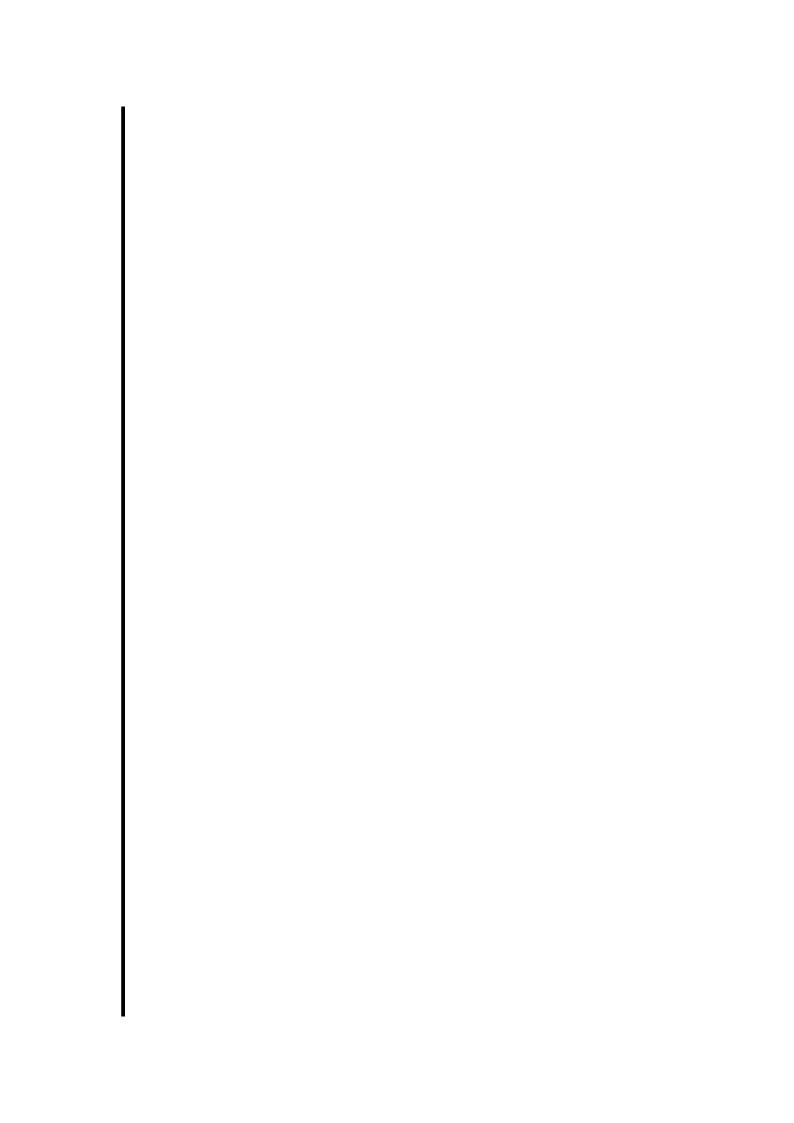
```
Player
neStatus
rds
: int
static int

ck:Decks,Board:Boards,type:TypePlayer,
fepoints:int)

: void
): void
: void
void
pints(degat :int): void
```

| I | | |
|--------------|--|--|
| | | |
| | | |
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| | | |
| | | |







#attack #defens #positi #effet +attack +attack +setSpe +Monste

+~Monst

```
: int
e: int
on: bool
: int

Card(card:Cards): void
Player(player:Players): void
ll(): void
rs(idCard:int,name:std::string,descripti
    typeCarte:CardTypes,effet:int,level:i
    attack:int,defense:int,position:bool)
ers()
```

```
ion:std::string,
int,
)
```

```
#numberOfCards: int = '
+Decks(cardsInDeck:std
+Decks()
+~Decks()
+shuffle(): void
+drawCard(): void
+addCard(): void
+removeCard(): void
```

```
::vector<Cards>,cardsInHands:std::vector
```

```
#type: std::string = "test"
+isMonster(): void
+isSpell(): void
+isTrap(): void
+CardTypes(type:std::string)
+~CardTypes()
```

-<Cards>)

