

## Exercise #1.5: Advanced Trusted Data Feed

### Details:

The Trusted Data Feed contains an integer.

In the beginning this value is set in the constructor by the creator of the contract.

Afterwards the value can be modified by calling the update function. This can only be done by the original creator of the contract.

Whenever the value is updated the contract emits the Update event.

The Feed also has a getter function `getValue` which other contracts can use to read the value, if they send at least 1 ether with the message. This payment is forwarded to the contract creator. Otherwise throw

### Interface:

```
function Feed(uint initialValue);  
event Update(uint value);  
function update(uint value_);  
function getValue() returns (uint);
```

### Example:

Bob creates the data feed with the initial value 5

Alice uses the getter function with 2 ether and gets 5. Bob receives 2 ether.

Bob calls the update function with 7

Alice uses the getter function with 1 ether and gets 7. Bob receives 1 ether.

Alice calls the update function with 10

(the feed remains unchanged because Alice is not the creator)

Alice uses the getter function with 1 ether and gets 7. Bob receives 1 ether.

Alice uses the getter function with 0.9 ether. The message ends with a throw.

**Relevant global variables:** `msg.sender`, `msg.value`

**Hints:** `address.send(value)`, use `require` to cancel execution, payable modifier