

## CoCoA-5 - Bug #749

### IsDefined does not follow reference to undefined optional param

27 Jul 2015 16:20 - John Abbott

<b>Status:</b>	New	<b>Start date:</b>	27 Jul 2015
<b>Priority:</b>	Normal	<b>Due date:</b>	
<b>Assignee:</b>		<b>% Done:</b>	0%
<b>Category:</b>	Parser/Interpreter	<b>Estimated time:</b>	0.00 hour
<b>Target version:</b>	CoCoA-5.?.?	<b>Spent time:</b>	1.60 hour
<b>Description</b>			
The pseudo-function IsDefined has weird semantics.			
Consider this example:			
<pre>define IsVerbose(ref VerbFlag)   if not(IsDefined(VerbFlag)) then return false; endif;   if VerbFlag &lt;&gt; "verbose" then error("expected \"verbose\""); endif;   return true; enddefine;  define MyFunc(X, opt OptArg)   VerboseFlag := IsVerbose(ref OptArg);   ... enddefine;</pre>			
If MyFunc is called with 1 arg then inside MyFunc the parameter OptArg is not defined, but when inside IsVerbose the call to IsDefined(VerbFlag) returns <b>true</b> .			
JAA thinks that IsDefined should follow references -- this would lead to the simple criterion that if IsDefined(V) produces true then the variable V actually has a value.			

### History

#### #1 - 27 Jul 2015 16:25 - John Abbott

Anna points out that there is a workaround:

```
define IsDefd(ref V)
  try
    junk := V;
  uponerror err do
    return false;
  endtry;
  return true;
enddefine;
```

Not pretty :-)

Surely IsDefined should already be doing exactly this!?

**#2 - 27 Jul 2015 16:26 - John Abbott**

The relevant source code seems to be at `Interpreter.C:3403`

Update: Mmmm, uncommented code looks scary :-(

**#3 - 31 Jul 2015 12:08 - John Abbott**

- *Subject changed from `IsDefined` does not follow references to `IsDefined` does not follow reference to undefined optional param*

JAA is having trouble understanding what the code does/should do. Can Giovanni help?