

The **Black Box Toolkit**

Developers' Guide

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Chapter 1

Introduction

Chapter 2

Misc

2.1 Displaying messages

```
bbtkMessage("Kind",level,"message "<<"to "<<" display : i="<<i<<std::endl);  
bbtkDebugMessage("Kind",level,"message "<<"to "<<" display : i="<<i<<std::endl);
```

2.2 Types and RTTI

In `bbtk` the class conveying the information on a type is

```
bbtk::TypeInfo
```

which is simply a typedef on

```
const std::type_info&
```

Remember that all constructors of the `std::type_info` class are private, hence objects can only be created by the operator `typeid` which returns a `const` reference on a `type_info`. Hence the `bbtk` type `TypeInfo` conveys that `const` reference and cannot be itself referenced. Any function or method which takes or returns a `TypeInfo` must take or return it *by value* (see e.g. the `TypeName` function below). To print the name of a type use one of the template functions

```
template <class T> std::string TypeName();  
template <class T> std::string TypeName(const T&);  
template <class T> std::string TypeName(bbtk::TypeInfo);  
  
BBTK_DEFINE_HUMAN_READABLE_TYPE_NAME(std::string,"string");
```