Proposed software architecture

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1 Why haxe

Haxe is a practical cross-platform toolkit making it simpler to maintain multiplatform projects. In this document we outline our reasons for choosing Haxe by showing sample listing of the various targets that get generated by Haxe. In addition to these files, it supports multiple targets including native support for iPhone and Android; the platforms that are relevant to the current dApp.

2 Sample haxe code

```
class BlockHeaderWithData {
 var header : BlockHeader;
 * TODO: Bytes types wraps platform dependent bytes.
 * Check on irc if this is the right way to doing this.
 */
 var data : Bytes;
}
class IdPoint {
 var address : String;
 var port : Int;
}
class Connection Version {
 var name: String;
 var major : Int;
 var minor : Int;
}
class Metadata {
```

```
var data: Bytes; //TO Be completed
class ConnectionInformation {
  var incoming : Bool;
  var peerId : PeerId;
  var idPoint : IdPoint;
  var remoteSocketPort : Int;
  var versions : List<ConnectionVersion>;
    Generated cpp code
3
// Generated by Haxe 3.4.7
#include <hxcpp.h>
#ifndef INCLUDED_realitz_tezos_rpc_ConnectionVersion
#include <realitz/tezos/rpc/ConnectionVersion.h>
#endif
namespace realitz {
namespace tezos {
namespace rpc{
void ConnectionVersion_obj::__construct() { }
Dynamic ConnectionVersion_obj::__CreateEmpty() { return new ConnectionVersion_ob
void *ConnectionVersion_obj::_hx_vtable = 0;
Dynamic ConnectionVersion_obj::__Create(hx::DynamicArray inArgs)
  hx::ObjectPtr< ConnectionVersion_obj > _hx_result = new ConnectionVersion_obj (
  hx_result \rightarrow construct();
  return _hx_result;
bool ConnectionVersion_obj::_hx_isInstanceOf(int inClassId) {
  return in ClassId==(int)0x00000001 || in ClassId==(int)0x7c21c9d1;
    Generated Java code
// Generated by Haxe 3.4.7
package realitz.tezos.rpc;
```

```
@SuppressWarnings(value={"rawtypes", "unchecked"})
public class ConnectionVersion extends haxe.lang.HxObject
{
   public ConnectionVersion(haxe.lang.EmptyObject empty)
   {
      public ConnectionVersion()
      {
            //line 144 "/home/dinkarg/realitz/src/haxe/realitz/tezos/rpc/BlockHeader.hx"
            realitz.tezos.rpc.ConnectionVersion._-hx_ctor_realitz_tezos_rpc_ConnectionVersion()
      }
      public static void _-hx_ctor_realitz_tezos_rpc_ConnectionVersion(realitz.tezos {
        }
      public java.lang.String name;
      public int major;
      public int minor;
```