*IMPS文档说明*

*=================================================================================*

1. *凡以C\_开始的协议都为客户端发起协议*
2. *凡以S\_开始协议都为服务器端发起协议*

*注：本协议使用长连接实现，每个UTF串之前加一个串的SIZE参数*

*协议头*

*CMNET协议头*

|  |  |  |
| --- | --- | --- |
| *TAG* | *2* | *内容为OK* |
| *Content-Length* | *2* | *内容长度* |

*协议内容*

*===================================================================================*

*登陆部分：*

*C\_LOGIN\_REQ*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *用户名* |
| *Password* | *UTF* | *密码* |

*S\_LOGIN\_RSP*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *用户名* |
| *Gender* | *1* | *性别* |
| *Email* | *UTF* | *邮箱* |

*心跳检测部分：*

*C\_HEARTBEAT\_REQ*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *用户名* |
| *DataSize* | *4* | *位置信息个数* |
| *以下根据DataSize大小循环* |  |  |
| *Time* | *UTF* | *位置时间* |
| *Location* | *UTF* | *经纬度,e.g.: 23.34,23.43* |

*S\_HEARTBEAT\_RSP*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |

*好友信息刷新:*

*C\_FRIENDLIST\_REFURBISH\_REQ*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *用户名* |

*S\_FRIENDLIST\_REFURBISH\_RSP*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *FriendSize* | *2* | *好友个数* |
| *以下根据FriendSize循环* | | |
| *FriendName* | *UTF* | *好友名* |
| *Status* | *1* | *当前状态（2：在线 1:隐身 0:不在线）* |
| *Time* | *UTF* | *位置时间* |
| *Location* | *UTF* | *经纬度* |

*添加好友信息:*

*C\_ADDFRIEND\_REQ*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *用户名* |
| *friendName* | *UTF* | *好友名* |

*C\_ADDFRIEND\_RSP*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *用户名* |
| *Action* | *1* | *操作(1:同意添加 0：拒绝添加)* |

*S\_ADDFRIEND\_REQ*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *friendName* | *UTF* | *好友名* |

*S\_ADDFRIEND\_RSP*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *STATUS* | *1* | *1：成功 0:失败 -1:好友不存在* |
| *STATUS == 1* | | |
| *UserName* | *UTF* | *好友昵称* |
| *Status* | *1* | *用户状态* |
| *Time* | *UTF* | *时间* |
| *Location* | *UTF* | *经纬度* |

发送信息：

*C\_SEND\_MSG*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *用户名* |
| *friendName* | *UTF* | *好友ID* |
| *Message* | *UTF* | *消息内容* |

*S\_SEND\_MSG*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *friendName* | *UTF* | *好友名* |
| *Message* | *UTF* | *消息内容* |
| Datetime | *UTF* | *发送时间* |

好友状态刷新：

C\_STATUS\_NOTIFY

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *用户名* |
| *Status* | *1* | *用户状态* |

*S\_STATUS\_NOTIFY*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *通知的好友名* |
| *Status* | *1* | *好友状态* |

用户注册：

C\_REGISTER

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *UserName* | *UTF* | *用户名* |
| *Password* | *UTF* | *密码* |
| *Gender* | *1* | *性别* |
| *Email* | *UTF* | *邮箱* |

S\_REGISTER

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *Response* | *1* | *注册结果(0:用户名已存在，1:注册成功)* |

*错误处理：*

*S\_Error\_RSP:*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *Response* | *1* | *返回结果* |
| *Response可能的值为：* |  |  |
| *0：操作成功* | *1：用户已经存在* | *2：用户不存在* |
| *3：用户当前状态不可操作* | *4：用户已经登录* | *5：用户当前离线* |
| *6：用户名或密码不正确* | *7: 用户在别处登录* | *8* |
| *9* | *10* | *11* |

*音频处理*

*S\_AUDIO\_RSP:*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *FriName* | *Utf* | *发送音频的好友名* |
| *DATA* | *Byte[]* | *音频流* |
| Datetime | *UTF* | *发送时间* |

*C\_AUDIO\_REQ:*

|  |  |  |
| --- | --- | --- |
| *CMDTYPE* | *1* |  |
| *friendName* | *UTF* | *好友名* |
| *Message* | *Byte[]* | *消息内容* |
| Datetime | *UTF* | *发送时间* |