GUI

+ startUpMenu(): v
-login(ChatRoom
-youAreLogin(Chat
-closeChatApp(); v
-button_Click(): int
-printAlerts(string s
-printUiMessages(s

User :IComparable , ISerializable-Business logic

- nickName: string
- group_Id: string
- status : bool
+ SendMessage(string msgcontent): Message
+ logOut(): void
+changeNickname(string newName): void
+ isOnline(): bool
+CompareTo(object obj):int

ChatRoo

- loggedinUser: User
- Message:List
- Users: List
-Url : string
+ login(string nickName, stri
+ registration(string newNick
+ rerieveMessages(int mum
+dispRetrievedMessages(in
+ dispMsgB\yUser(string nic
-alreadyExists(string nn, stri
-getUser(string nn, string g_
-getMessage(string msg):Me
+ send (string msg): void
-isExists(Message msg):boo
-changeNickname(string nev

FileHandl

I_CLI/Main -Presentation

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void

chat):bool

room chat)

oid

tr):void

string str)

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om - Business logic

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ng g_ID): void

kName, String g_ID): void

n):void

t num): List<Message>

kName, string g_ID):List<Message>

ng g_id):bool

id):bool

essage

ol

wName):void

Message : IComparable , ISerializable -Business logic

- timeStamp: DateTime

-messageBody: string

- writer_gID: string

- isSent: bool

- isRecived: bool

- writer_name: string

-guidname : Guid

+covertImessage(IMessagee mess) :Message

+checkContentValidity(string msg) : bool

+CompareTo (object obj)
+ Save(): void

+ editMessage(String msg): void

- checkContentValidity(String msg): boolean

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er - Data (Persistance)

FileHandl

-instance : FileHandler

-DirectoryInfo : currDir

-userListPath: string

-msgListPath : string

-streamUsers : stream

-streamMsg : Stream

- bf : BinaryFormatter

+AmiHoffman :FileHandler

-saveUserList (List <User> Lis

- saveMessageList(List <Mes

- loadMessageList(): List <Me

- LoadUserList(): List<User>

er - Data (Persistance)

stpoint): void

sage> Listpoint): void

essage>