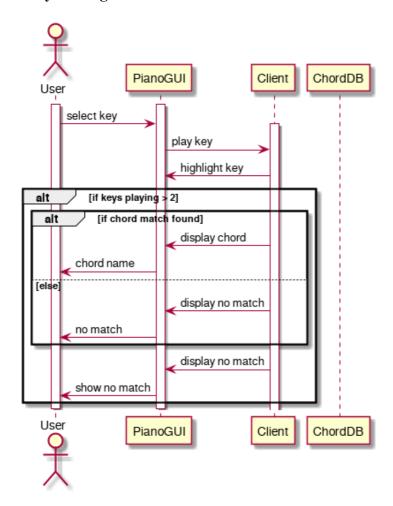
# **Sequence Diagram Documents**

## **Find Chord**

### **Analysis Diagram**



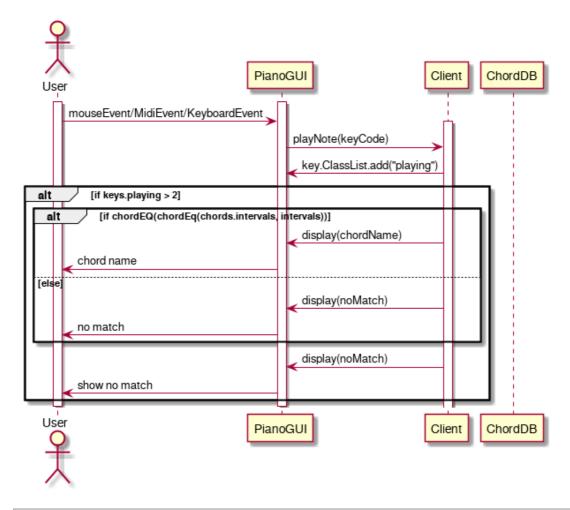
### **Description**

#	Subject	<b>Subject Action</b>	<b>Parameters</b>	Object acted upon
1	User	select	key	PianoGUI
2	PianoGUI	play	key	Client
2.1	Client	highlight	pianoKey	PianoGUI
3	If > 2 playing notes			
3.2	If Chord Match found	l		
3.2.2	Client	display	chord	PianoGUI
3.2.3	PianoGUI	show	chord	User
3.2	else			
3.2.1	Client	display	no match	PianoGUI
3.2.2	PianoGUI	show	no match	User
3	else			
3.1	Client	display	no match	PianoGUI

**# Subject Action Parameters Object acted upon** 

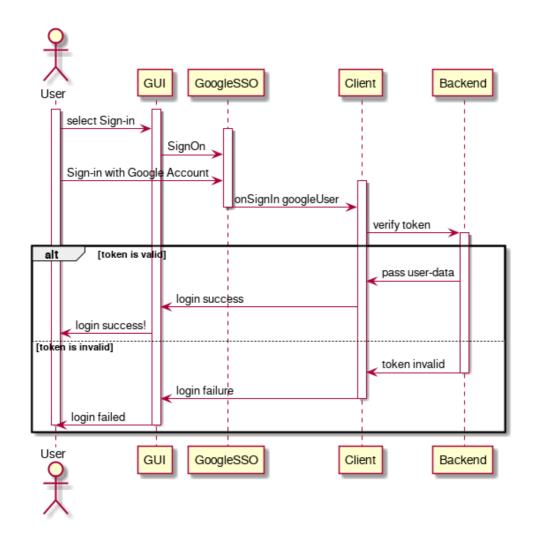
3.2 PianoGUI show no match User

### **Design Diagram**



## Sign in with Google

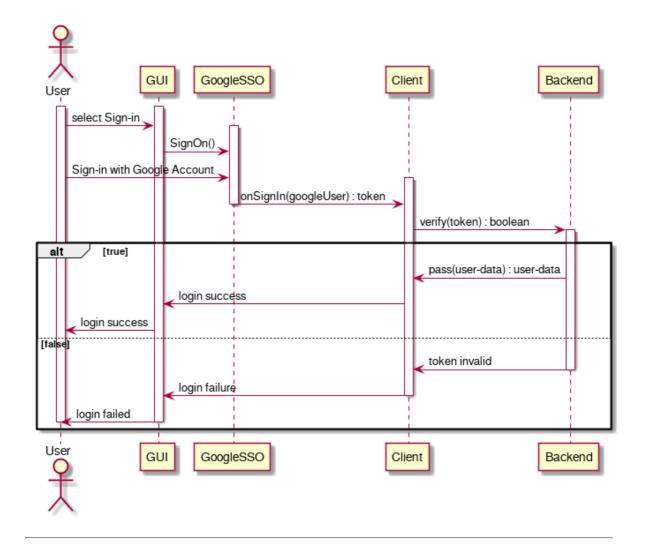
**Analysis Diagram** 



### **Description**

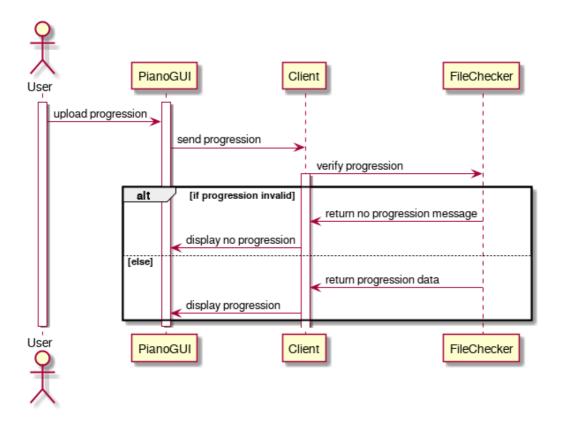
#	Subject	<b>Subject Action</b>	<b>Parameters</b>	Object acted upon
1	User	select	Sign-in	GUI
1.1	GUI	sign-in	Google	GoogleSSO
2.1	User	sign-in	Google account	GoogleSSO
4.	GoogleSSO	onSignOn	googleUser	Client
4.1	Client	verify	token	Backend
4.2	If token is valid			
4.2.1	Backend	pass	user-data	Client
4.2.2	Client	message	login success	GUI
4.2.3	GUI	message	logged in	User
4.2	else			
4.2.1	Backend	message	token invalid	Client
4.2.2	Client	message	login failure	GUI
4.2.3	GUI	message	login failed	User

### **Design Diagram**



## **Upload Progression**

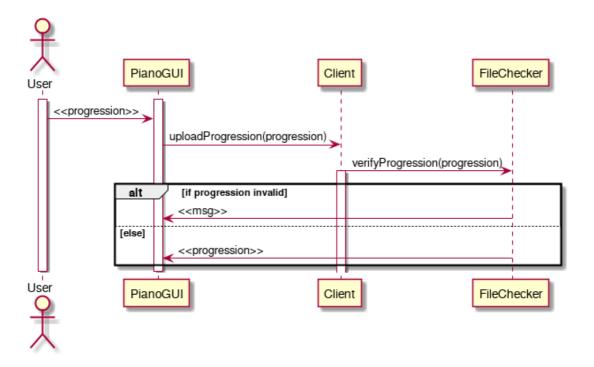
**Analysis Diagram** 



### **Description**

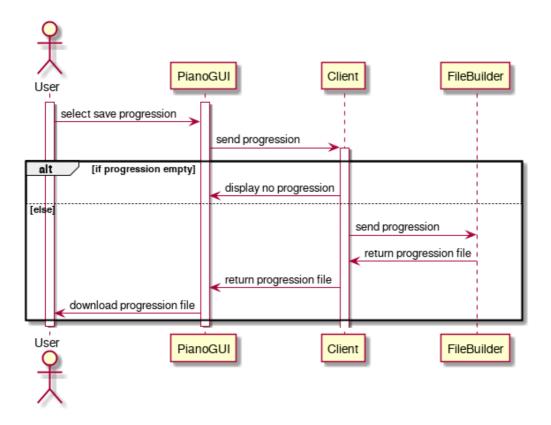
#	Subject	<b>Subject Action</b>	<b>Parameters</b>	Object acted upon
1	User	upload	Progression	GUI
2	GUI	send	Progression	Client
3	Client	send	Progression	FileChecker
4.1	If progression is valid			
4.1.1	FileChecker	returns	message	client
4.1.2	Client	displays	message	GUI
4.2	else			
4.2.1	FileChecker	returns	message	client
4.2.2	Client	displays	message	GUI

## Design Diagram



### **Download Progression**

#### **Analysis Diagram**



### **Description**

# Subject Action Parameters Object acted upon
1 User save Progression GUI

#	Subject	<b>Subject Action</b>	<b>Parameters</b>	Object acted upon
2	GUI	send	Progression	Client
3.1	If progression is valid			
3.1.1	Client	displays	message	GUI
3.2	else			
3.2.1	Client	sends	Progression	FileBuilder
3.2.2	FileBuilder	returns	file	Client
3.2.3	Client	returns	file	GUI
3.2.4	GUI	sends	file	User

### **Design Diagram**

