

# Innovative Practice of Mobile Authentication in China Mobile

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## 2 Fundamental Products

### One-Click Login



#### Introduction

- Complete APP login or registration with one-click authorization.

#### Achievement

- More than 1800 apps adopt it
- including terminals, e-commerce, tools, entertainment, education, travel etc.

### Cellphone Number Verification



#### Introduction

- the mobile phone number input by the user;
- the verification process does not need of receiving or entering any passcode;
- the number is not sent to the developer.

#### Achievement

- Solve the delay of short message passcode;
- reduce the risk intercepted/tampered by the pseudo-base station and virus snooping.
- Partners including CMB, Alipay, etc.

# Use Case of One-Click Login : iQYI



Demonstration



Click to Login



Authorization

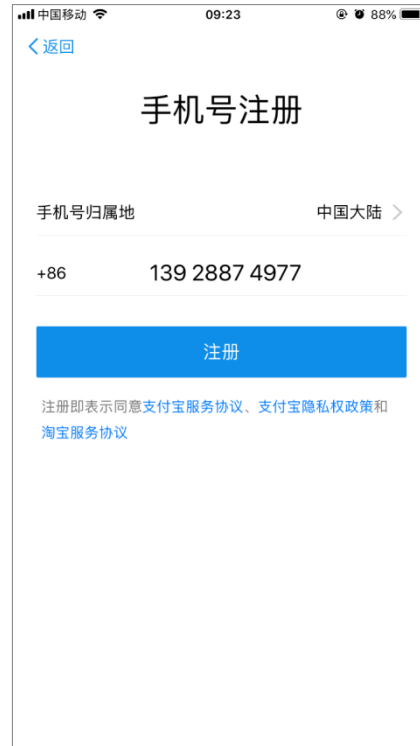


Login  
successfully

# Use Case of Cellphone Number Verification: Alipay



Demonstration



Input phone number



Verify the phone number is a native number or not



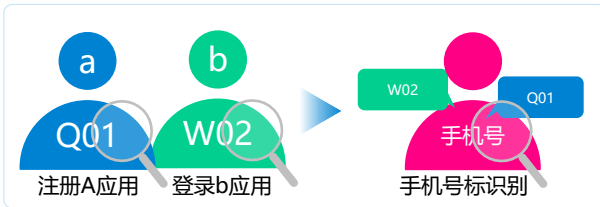
Login successfully

## 3 Concepts

### Imperceptible

No need to log in

A unique ID is to identify

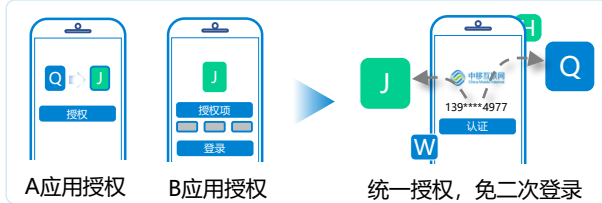


- Unique ID is all it requires to identify users
- Registration or login will interrupt the whole process of users' journey
- Is there an imperceptible way to identify users as well as to keep privacy under control?

## 3 Concepts

### Neutral & Unified platform

Unified authentication  
among different apps

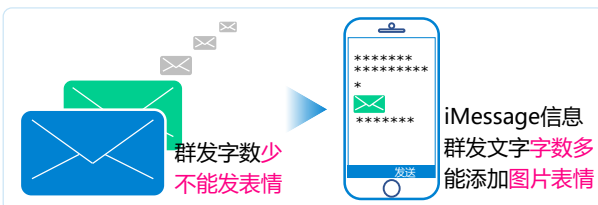


- Single app can only meet limited demands
- People often transfer among different apps, and register or login repeatedly.
- Is there a neutral and unified platform that one registration is required no matter how many apps are transferred?

## 3 Concepts

### Function upgrade

innovative application,  
fast and convenient



- For traditional mobile network products, such as short message service, there has been no iteration for nearly 20 years.
- Can MNOs do a better product by applying the mobile authentication?

# Use Case 1: imperceptible authentication

## Exclusive Mobile Data Plan

A type of plan with limited amount of data which can only be used in specific apps, like video, games, music, etc.



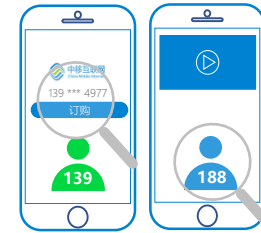
SPs:

- give alert to the user about data usage:
- whether has a plan;
- whether the data in the plan has been used up



MNOs :

- accurately charge users both inside and outside the plan.



Users:

- prone to error: the number may not be the one really used.



# Use Case 1: imperceptible authentication

## Traditional solution

In the traditional solution, SPs needs to guide all users to log in each time they enter the app, and to connect their account with their cellphone number used for the package subscription, and then synchronize this number to the MNO.



# Use Case 1: imperceptible authentication

## OpenID solution

MNOs can obtain the user's cellphone number, and calculate an openID based on the cellphone number at the same time

### The first step:

To establish the subscription relationship with openID.



### The second step:

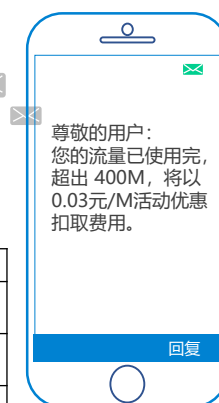
To query the relationship between the openID and the subscription



### The third step:

To bill through the plan information associated with the openID

扣费系统	
应用ID	Q01
用户ID	1394977
套餐	98
套餐内	2G+3G
套餐外	400M



## Use Case 2: Neutral & Unified platform

Read emails directly from the message list of And Fetion



## Use Case 2: Neutral & Unified platform

Convenient shopping: RCS & Lingnan Youpin



RCS platform



Authorization



Shopping

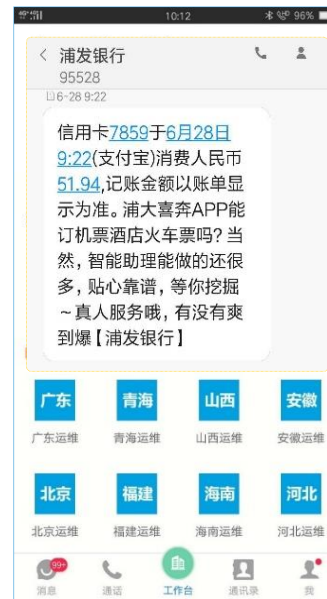


Orders Confirmation

## Use Case 3: Function Upgrade

### RCS Smart SMS

- Traditional SMS with poor interactivity;
- The sending box will be upgraded into a menu, enrich the information



Tradition SMS



Smart SMS



Business handling

## Use Case 3: Function Upgrade

### red envelope in RCS

- spread based on phone number
- support sharing red envelope with strangers



Start



Set and Sent



Receive



## Vision:

from the connection between people and applications  
to the connection between applications and applications, data, and  
channels

