Telco APIs - Service Delivery Platforms, an Enabler of New Business Models

Description: The concept of APIs (Application Programming Interfaces) has become ever more important with the rise of the Internet economy, both fixed and mobile, with the internet titans offering APIs for third party developers to develop upon. Telcos have reacted by building APIs on top of their SDP strategies thus further enlarging the developer platform of these Internet titans.

This report benchmarks the most important initiatives and projects of telcos and vendors, then analyses their strategies on both SDP and APIs, for both internal and external business models.

- How can APIs develop and consolidate telco businesses?
- What role for service delivery platforms (SDP) in telco networks?
- What are the impacts of SDP on telco positioning?
- What are the notable business models in this new market? How can SDP enable 2-sided business models?
- Can telcos and vendors face the Internet Titans to market APIs, after leaving them this battlefield alone for a long time?

About the Contributors:

Tiana Ramahandry, a Senior Consultant, joined IDATE in 2005.

Tiana’s assignments are mainly focused on the telecom equipment sector and equipment suppliers’ strategies. She specifically works on Next Gen infrastructurerelated projects on behalf of equipment providers and telecom operators. Her other areas of expertise also include traffic management, CDN and cloud computing. Ms. Ramahandry holds a post-graduate professional degree in Cable Networks, from the Université de Lille, and a Masters in Business Administration from the IAE de Bordeaux IV.

Vincent BONNEAU, Head of Internet Business Unit

Soichi NAKAJIMA, Senior Consultant

Contents:

1. Executive Summary
   1.1. The role of SDP and APIs as key enablers in NGN transition
   1.2. The value of SDP and APIs for telcos
   1.3. Telcos implementing APIs
2. Methodology
3. Introduction: the APIs of Internet giants
4. Telco strategies around APIs
   4.1. SDP concept and impact
   4.2. SDP implementation
   4.3. SDP and API trends
   4.4. Common initiatives
      4.4.1. OneAPI by GSMA
      4.4.2. OMA (Open Mobile Alliance)
      4.4.3. Wholesale Application Community (WAC) initiative
      4.4.4. OMTP Bondi initiative
      4.4.5. TM Forum
   4.5. Business model around APIs
5. Equipment vendor strategies
   5.1. Alcatel-Lucent
   5.2. Ericsson
   5.3. Cisco
   5.4. Alpina
   5.5. Apigee
   5.6. Twilio

More information from http://www.researchandmarkets.com/reports/2383002/
6. Telco API initiatives down the long tail
6.1. Overview comparisons of key elements regarding API provisioning between the eight profiled operators
6.2. Orange Partner / Orange API
6.3. AT&T Developer Program
6.4. Verizon Developer Community
6.5. Telenor Fusion
6.6. Telefonica BlueVia
6.7. DT Developer garden
6.8. Telecom Italia Apploaders
6.9. Vodafone Developer
7. Appendix
SMS API and MMS API
E-mail API (Orange)
Wap Push API (AT&T)
Click-to-call API
Conference call API
Voice mash-up (Interactive voice by Orange, Telekom Tropo by DT)
Voice Record API
In-app messaging API
Location API
Device status API
Personal APIs by Orange
Operator billing API
Authentication API
Cloud user management
Advertising
M2M
mHealth Platform
Scout24

Tables
Table 1: Comparison of communication APIs available from the operators
Table 2: Comparison of business models deployed by operators for user of their APIs
Table 3: APIs used per type of application
Table 4: Telecom Italia services catalogue
Table 5: Apigee offering and pricing
Table 6: Comparison of communication APIs available from the operators
Table 7: Comparison of personal APIs available from the operators
Table 8: Comparison of operator monetisation and authentication APIs available from operators
Table 9: Comparison of other (mainly business-oriented) APIs available from operators
Table 10: Comparison of business models deployed by operators for user of their APIs
Table 11: Comparison of whether operator API platforms also offer application stores
Table 12: Orange distribution channels for mobile applications
Table 13: APIs available on AT&T Developer Program
Table 14: BlueVia APIs revenue-sharing percentages and available countries
Table 15: List of personal data available through User Content API

Figures
Figure 1: SDP concept
Figure 2: Two-sided business model
Figure 3: API telcos’ strategy around APIs to gain additional revenue
Figure 4: Social graph representations
Figure 5: Examples of social plug-ins (APIs) available from Facebook
Figure 6: APIs provided by Google
Figure 7: The Wall Street Journal using Google Maps APIs
Figure 8: Top players for API requests per day
Figure 9: APIs from Twitter
Figure 10: SDP concept
Figure 11: SDP and API at multiple layers
Figure 12: OpCo abstraction
Figure 13: SDP vision
Figure 14 Portugal Telecom Service Delivery Broker
Figure 15: Bouygues Telecom Service Broker approach
Figure 16: OneAPI reference implementation
Figure 17: OneAPI initial phase
Figure 18: Architecture for Canada API platform
Figure 19: Single implementation of three operators
Figure 20: OneAPI gateway use case
Figure 21: OMA network APIs
Figure 22: Bondi architecture overview
Figure 23: Service Delivery Platform
Figure 24: Two-sided business model
Figure 25: Open API Platform at the core of the application enablement strategy of Alcatel-Lucent
Figure 26: Ericsson eStore ecosystem
Figure 27: Aepona API Monetisation Platform
Figure 28: Aepona view on telco business model evolution
Figure 29: Phone call through Twilio API
Figure 30: Ready-to-use solutions by Orange API
Figure 31: Ready-to-use solutions by Orange API
Figure 32: The three “advanced” APIs available from Orange Partner
Figure 33: APIs available from Orange APIs
Figure 34: Orange's personal APIs
Figure 35: Business model for AT&T Developer Program API use
Figure 36: APIs available from Verizon Developer Community
Figure 37: Example of in-app purchase enabled by Verizon in-app purchase API
Figure 38: APIs available from Telenor Fusion
Figure 39: Business model (monthly subscription) for SMS access API
Figure 40: Business model for payment APIs
Figure 41: Screenshot of BlueVia tour page; a cool, comic type approach
Figure 42: Telefonica UNICA APIs
Figure 43: The APIs provided in BlueVia by Telefonica
Figure 44: Direct-to-billion on Facebook: some operators offering an easy two-click process
Figure 45: BlueVia promoting the sale of digital goods
Figure 46: Mobile billing solution offered by Boku
Figure 47: The APIs provided in Developer Garden by Deutsche Telekom
Figure 48: Example of use: SMS delivery for internal use
Figure 49: Business models supported
Figure 50: Vodafone developer portal’s ‘APIs’ directs users to joyn by GSMA
Figure 51: Vodafone Developer portal offers APIs in the form of services
Figure 52: Flow of app development to distribution in emerging markets through Vodafone
Figure 53: Example of SMS API (send and receive by Orange)
Figure 54: E-mail API by Orange
Figure 55: Example of WAP push sample call flow
Figure 56: Work flow for connecting two telephone numbers through the API
Figure 57: Workflow of managing a conference on DT’s Conference call API
Figure 58: The Telekom Tropo API working with developer server
Figure 59: AT&T Watson engine used for the speech API
Figure 60: Location API by Orange API
Figure 61: Orange personal APIs
Figure 62: Authentication API by Orange
Figure 63: Shepherd service by Telenor Objects
Figure 64: M2M APIs from the M2M Developer community within Developer Garden
Figure 65: The mHealth concept of AT&T
Figure 66: Top page of AutoScout

Ordering:
Order Online - http://www.researchandmarkets.com/reports/2383002/
Order by Fax - using the form below
Order by Post - print the order form below and send to

Research and Markets,
Guinness Centre,
Taylors Lane,
Dublin 8,
Ireland.
Fax Order Form
To place an order via fax simply print this form, fill in the information below and fax the completed form to 646-607-1907 (from USA) or +353-1-481-1716 (from Rest of World). If you have any questions please visit http://www.researchandmarkets.com/contact/

Order Information
Please verify that the product information is correct and select the format(s) you require.

<table>
<thead>
<tr>
<th>Product Name:</th>
<th>Telco APIs - Service Delivery Platforms, an Enabler of New Business Models</th>
</tr>
</thead>
<tbody>
<tr>
<td>Web Address:</td>
<td><a href="http://www.researchandmarkets.com/reports/2383002/">http://www.researchandmarkets.com/reports/2383002/</a></td>
</tr>
<tr>
<td>Office Code:</td>
<td>SCAV8FJD</td>
</tr>
</tbody>
</table>

Product Formats
Please select the product formats and quantity you require:

<table>
<thead>
<tr>
<th>Quantity</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Electronic (PDF) - 1 - 5 Users:</td>
<td>USD 1408</td>
</tr>
<tr>
<td>Electronic (PDF) - Enterprisewide:</td>
<td>USD 2112</td>
</tr>
</tbody>
</table>

Contact Information
Please enter all the information below in BLOCK CAPITALS

<table>
<thead>
<tr>
<th>Title:</th>
<th>Mr ☐</th>
<th>Mrs ☐</th>
<th>Dr ☐</th>
<th>Miss ☐</th>
<th>Ms ☐</th>
<th>Prof ☐</th>
</tr>
</thead>
<tbody>
<tr>
<td>First Name:</td>
<td>___________________________</td>
<td>Last Name:</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Email Address: *</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Job Title:</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Organisation:</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Address:</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>City:</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Postal / Zip Code:</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Country:</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Phone Number:</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Fax Number:</td>
<td>___________________________</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* Please refrain from using free email accounts when ordering (e.g. Yahoo, Hotmail, AOL)
Payment Information

Please indicate the payment method you would like to use by selecting the appropriate box.

☐ Pay by credit card: You will receive an email with a link to a secure webpage to enter your credit card details.

☐ Pay by check: Please post the check, accompanied by this form, to:

Research and Markets,
Guinness Center,
Taylors Lane,
Dublin 8,
Ireland.

☐ Pay by wire transfer: Please transfer funds to:

<table>
<thead>
<tr>
<th>Account number</th>
<th>833 130 83</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sort code</td>
<td>98-53-30</td>
</tr>
<tr>
<td>Swift code</td>
<td>ULSBIE2D</td>
</tr>
<tr>
<td>IBAN number</td>
<td>IE78ULSB98533083313083</td>
</tr>
<tr>
<td>Bank Address</td>
<td>Ulster Bank, 27-35 Main Street, Blackrock, Co. Dublin, Ireland.</td>
</tr>
</tbody>
</table>

If you have a Marketing Code please enter it below:

Marketing Code: ____________________________

Please note that by ordering from Research and Markets you are agreeing to our Terms and Conditions at http://www.researchandmarkets.com/info/terms.asp

Please fax this form to:
(646) 607-1907 or (646) 964-6609 - From USA
+353-1-481-1716 or +353-1-653-1571 - From Rest of World