I. Introduction

1. The OECD.Graph solution assists authors by automating the formatting of graphs, facilitating the creation of alternative language versions and automating the generation of associated StatLink files (catalogued Excel files for dissemination). It is a highly innovative approach to charts production that enables significant efficiency gains through industrialization, also transforming the chart into a piece of smart content that can be easily produced, shared and repurposed.

II. Description of the solution

A. What is OECD.Graph and why is it important?

2. OECD.Graph is a chart production tool integrated in Excel that enables statisticians in author directorates to drastically reduce the time they spend preparing graphs for production, allowing them to redirect their energies to data analysis. The tool has also brought significant efficiency and enhancements to translators and to the Publications Directorate (PAC), by a better integrated end-to-end approach to the chart management life cycle.

3. OECD.Graph allows structuring the information management process around charts production, transforming charts into a smart piece of knowledge that can be integrated into a collaborative and enrichment process. Combined with the OECD.Stat chart engine developed as part of OECD open data
strategy, OECD.Graph enables users to smoothly retrieve data from the corporate warehouse and transform them into charts (and later tables) through a standard and easy process.

4. **OECD.Graph** is hence strategically positioned to bridge the gap between the authoring process and the statistical process, and make charts and tables structured and smart pieces of knowledge, easy to produce and repurpose as part of an integrated authoring and collaborative environment.

5. Through intensive developments based on the analysis of users’ needs over the past 18 months major, processes with important charting activities have been industrialized thanks to the solution and related innovative working practices. The user base has been multiplied by 4, signalling a strong need the solution meets across the house.

6. **OECD.Graph** drives important efficiencies in all directorates across the organization. It is a good illustration of how working practices and processes can be improved, contributing to more value for money, through a continuous process of innovation driven by the users’ needs.

B. **What are the main issues OECD.Graph resolves?**

7. There are three time-consuming tasks associated with graphics production:

   (a) **Formatting.** Most statisticians in author directorates use MS Excel to create graphs for publications and official documents. In order to prepare the graphs with the OECD “look & feel”, they either spend a significant amount of time formatting graphs in Excel (colours, fonts, and layouts) to conform to OECD “Charte Graphique” or they send the graphics to the Publications Directorate (PAC) who reformat the graphs. Either way, a great deal of time is wasted manually formatting graphs. Additional time is added to production delay by author-PAC approval data and format checking.

   (b) **Translation.** Author directorates are also responsible for creating alternative language versions (often French) of their graphics. This typically involves sending a Word document containing images of the original language graphs (say English) to Translation Service. Translators then type the translated texts underneath the graphic images in the Word document through a highly cumbersome procedure; if the same text appears in several graphs, the same translation has to appear in several places in the document. Author directorates are then responsible for injecting the translated texts into new Excel graphs. This process usually involves several exchanges between authors and Translation Service.

   (c) **StatLinks.** Finally, author directorates are responsible for creating a “StatLink” file for each graph that appears in a publication. StatLink files contain the data behind the graphs and are accessible to users of OECD e-publications by clicking on hyperlinks located under each graph. The StatLink tables must be formatted in a particular way.

C. **OECD.Graph brings value to users and capitalizes related knowledge**

8. OECD.Graph offers a solution to each of these three issues. It also offers a mechanism to leverage knowledge and innovation: pooling all charts templates into one standard tool allows the Organization to better capitalize the knowledge across the Organization: one new template created for one directorate can benefit all the others.
9. **Formatting:** OECD.Graph formatting functions allow authors to choose style templates, colours and layouts in order to transform standard Excel graphs into publication-ready graphs with the OECD “look & feel”, compliant with corporate standard.

10. **Translation:** OECD.Graph translation functions allow Authors to extract text items from graphs into separate sheets which can then be translated either by the Authors or Translation Service and then automatically used to create French-language (or any alternative language) versions of the graphs, through a very elegant and efficient solution replacing a highly inefficient existing process. This feature was developed in partnership with the translation service.

11. **StatLinks:** OECD.Graph Create StatLink button in the OECD.Graph ribbon automates the generation of StatLink graph+data files which allow readers of e-publications to access and download the data behind graphs.

C. **From OECD.Graph to OECD.Table: streamlining table production processes**

12. In the future, OECD.Graph will be enhanced to provide formatting, translation and Statlinks for tables as well as for graphs. A pilot project with the FactBook – OECD’s flagship publication with country statistical profiles - has been successfully carried out this year, in partnership with PAC and the Statistics Directorate that demonstrated that OECD.Graph can be used to format Excel tables with the OECD “look & feel” and provide integration with documents in the new authoring environment.
13. **Table formatting – FactBook pilot in production:** OECD Table formatting functions will allow users to select from “table models” that define the table elements to format.

![Table Formatting](image)

...to create a table that is formatted according to the “OECD look & feel” and that can be easily integrated into the new authoring environment solution as a ‘smart table’.

II. **Evidence of impact**

A. **What is OECD.Graph usage?**

14. The usage of OECD.Graph within the OECD has increased significantly in 2013 (from 25 to over 100 users), supported by training seminars and ad-hoc sessions with statisticians in directorates in order to help them change their working practices:

![Graph Usage](image)

15. The very wide adoption of OECD.Graph to industrialise chart production in a number of publications is a key indicator that it meets a strong demand in the Organisation:

<table>
<thead>
<tr>
<th>Directorate</th>
<th>Publications for which OECD.Graph has been adopted as the solution to industrialise charts production</th>
</tr>
</thead>
<tbody>
<tr>
<td>CTP</td>
<td>Taxing Wages, Revenue Statistics&lt;br&gt;Also, presentations and working papers</td>
</tr>
<tr>
<td>DAF</td>
<td>Annual Survey of Large Pension Funds and Public Pension Reserve Funds&lt;br&gt;Pension Markets in Focus, Global Insurance Market Trends</td>
</tr>
<tr>
<td>DEV</td>
<td>Latin American Economic Outlook</td>
</tr>
<tr>
<td>EDU</td>
<td>Translation into French of Education at a Glance, the Skills Outlook, PISA initial report.</td>
</tr>
<tr>
<td>ENV</td>
<td>Environmental Performance Reviews, Environment at a Glance&lt;br&gt;Green Growth indicators</td>
</tr>
<tr>
<td>ECO</td>
<td>Going for Growth&lt;br&gt;Country Surveys (some)</td>
</tr>
<tr>
<td></td>
<td>Fiscal Federalism 2014, Making Decentralisation Work&lt;br&gt;Council presentations, Press Conference for Interim Assessment and Economic Outlook</td>
</tr>
</tbody>
</table>
### Directorate | Publications for which OECD.Graph has been adopted as the solution to industrialise charts production
---|---
ELS | Mental Health and Work
   | Displaced Workers
ITF | Outlook 2013
SG | OSG Brochures
STD | FactBook
   | Entrepreneurship at a Glance
   | How’s Life, National Accounts at a Glance
   | OECD Compendium of Productivity Indicators 2013 (STD and STI), OECD Compendium on Productivity
TAD | OECD/FAO Agricultural Outlook
   | Agricultural Monitoring & Evaluation

### B. What is the user feedback?

16. In summary, what users tell us is that OECD.Graph has helped them achieve tangible efficiency gains:

   (a) Saving a lot of time - for authors, translators and publishers leading to shorter production cycles
   (b) Helping to respect corporate look and feel and make more understandable and printable graphs with high quality even on B&W printers
   (c) Reducing manual interventions and have less errors – especially in the translation and publishing processes
   (d) Industrializing the charts production and translation cycle, especially in documents with numerous charts and which are repeated year to year