## POWER BI INTEGRATION

Monitor your most critical reporting data in Web or Mobile app.

# PBI API TECHNICAL SPECIFICATION

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## PREFACE

This document intended to be used to support end IT Management team in security / configuration related activities related to Power BI Integration extension for Magento developed by Kyrylo Kostiukov.

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#### THIRD PARTY ACCESS

No data will be shared with Extension provider.

The only endpoint where a request to <a href="https://www.bimproject.net/">https://www.bimproject.net/</a> website could be made is if online license for the extension is used. This request will download the full information about the license from bimproject.net to the Magento. During this request only Online License Key will be sent to bimproject.net website. Usage of Offline License will avoid communication with <a href="https://www.bimproject.net/">https://www.bimproject.net/</a> at all.

Data from Magento will be sent to Microsoft Cloud servers directly from Magento system.

#### API ENDPOINTS USED

The Power BI Integration extension is making the following REST API Requests as part of its functionality:

Core functionality of Power BI Integration:

- /datasets
- /datasets/{datasetId}/tables/{tableName}
- /datasets/{datasetId}/tables/{tableName}/rows
- /datasets/{datasetId}/tables/{tableName}/sequenceNumbers
- /reports
- /dashboards
- /dashboards/{dashboardId}
- /dashboards/{dashboardId}/tiles/{tileId}
- /groups/
- Same requests for Workspaces: e.g /groups/{groupId}/datasets/...

#### Embedding of reports into Magento:

- /datasets/{datasetId}/GenerateToken
- /reports/{reportId}/GenerateToken
- /dashboards/{dashboardId}/GenerateToken

#### Embedded Capacity Management (optional):

- /capacities
- /availableFeatures
- /reports/{reportId}
- /reports/{reportId}/Rebind
- /reports/{reportId}/Export
- /reports/{reportId}/Clone
- /reports/{reportId}/ExportTo

#### Report Templates management/backup:

/imports

Future functionality, also including the possibilities of PAWBO command line utility will allow also to call other Powe BI REST API requests. For example:

- /dataflows
- /dataflowStorageAccounts
- /gateways

- /gateways/{gatewayId}/datasources/{datasourceId}
- /groups/{groupId}/AssignToDataflowStorage

The corresponding APIs are documented by Microsoft on this pages:

https://docs.microsoft.com/en-us/rest/api/power-bi/

# APP PERMISSIONS REQUIRED

## Core Power BI Integration functionality:

API / Permissions name	Туре	Description
✓ Microsoft Graph (1)		
User.Read	Delegated	Sign in and read user profile
✓ Power BI Service (4)		
Dataset.Read.All	Delegated	View all datasets
Dataset.Read.All  Dataset.ReadWrite.All	Delegated Delegated	View all datasets  Read and write all datasets

## Core PBI Integration + Embedded Content:

API / Permissions name	Type	Description
✓ Microsoft Graph (1)		
User.Read	Delegated	Sign in and read user profile
✓ Power BI Service (6)		
Dashboard.Read.All	Delegated	View all dashboards
Dataset.Read.All	Delegated	View all datasets
Dataset.ReadWrite.All	Delegated	Read and write all datasets
Report.Read.All	Delegated	View all reports
Workspace.Read.All	Delegated	View all workspaces
Workspace.ReadWrite.All	Delegated	Read and write all workspaces

## Core PBI Integration + Embedded Content + Reports Management from Magento:

API / Permissions name	Туре	Description
✓ Microsoft Graph (1)		
User.Read	Delegated	Sign in and read user profile
✓ Power BI Service (8)		
Content.Create	Delegated	Create content
Dashboard.Read.All	Delegated	View all dashboards
Dataset.Read.All	Delegated	View all datasets
Dataset.ReadWrite.All	Delegated	Read and write all datasets
Report.Read.All	Delegated	View all reports
Report.ReadWrite.All	Delegated	Read and write all reports
Workspace.Read.All	Delegated	View all workspaces
Workspace.ReadWrite.All	Delegated	Read and write all workspaces

## All permissions + Automated Embedding Management:

API / Permissions name	Туре	Description
✓ Azure Service Management (1)		
user_impersonation	Delegated	Access Azure Service Management as organization users (
✓ Microsoft Graph (1)		
User.Read	Delegated	Sign in and read user profile
✓ Power BI Service (9)		
Capacity.Read.All	Delegated	View all capacities
Content.Create	Delegated	Create content
Dashboard.Read.All	Delegated	View all dashboards
Dataset.Read.All	Delegated	View all datasets
Dataset.ReadWrite.All	Delegated	Read and write all datasets
Report.Read.All	Delegated	View all reports
Report.ReadWrite.All	Delegated	Read and write all reports
Workspace.Read.All	Delegated	View all workspaces
Workspace.ReadWrite.All	Delegated	Read and write all workspaces

# All permissions mentioned before + utilization of PAWBO possibilities and permissions, future functionality may use:

API / Permissions name	Туре	Description
✓ Azure Service Management (1)		
user_impersonation	Delegated	Access Azure Service Management as organization users (
✓ Microsoft Graph (1)		
UserRead	Delegated	Sign in and read user profile
✓ Power BI Service (22)		
App.Read.All	Delegated	View all Power BI apps
Capacity.Read.All	Delegated	View all capacities
Capacity.ReadWrite.All	Delegated	Read and write all capacities
Content.Create	Delegated	Create content
Dashboard.Read.All	Delegated	View all dashboards
Dashboard.ReadWrite.All	Delegated	Read and write all dashboards
Dataflow.Read.All	Delegated	View all dataflows
Dataflow.ReadWrite.All	Delegated	Read and write all dataflows
Dataset.Read.All	Delegated	View all datasets
Dataset.ReadWrite.All	Delegated	Read and write all datasets
Gateway.Read.All	Delegated	View all gateways
Gateway.ReadWrite.All	Delegated	Read and write all gateways
Pipeline.Deploy	Delegated	Deploy in all pipelines
Pipeline.Read.All	Delegated	View all pipelines
Pipeline.ReadWrite.All	Delegated	Read and write all pipelines
Report.Read.All	Delegated	View all reports
Report.ReadWrite.All	Delegated	Read and write all reports
StorageAccount.Read.All	Delegated	View all storage accounts
StorageAccount.ReadWrite.All	Delegated	Read and write all storage accounts
UserState.ReadWrite.All	Delegated	Read and write user settings and state
Workspace.Read.All	Delegated	View all workspaces
Workspace.ReadWrite.All	Delegated	Read and write all workspaces

#### IP ADDRESSES WHITELISTING

IP Ranges for each cloud, broken down by region and by the tagged services in that cloud are now available on MS Download:

Public: <a href="https://www.microsoft.com/en-us/download/details.aspx?id=56519">https://www.microsoft.com/en-us/download/details.aspx?id=56519</a>

US Gov: http://www.microsoft.com/en-us/download/details.aspx?id=57063

Germany: http://www.microsoft.com/en-us/download/details.aspx?id=57064

China: http://www.microsoft.com/en-us/download/details.aspx?id=57062

These JSON files are updated weekly and include versioning both for the full file and each individual service tag in that file.