

DYNAMICS 365 PROJECT SERVICE AUTOMATION (PSA)

Dynamics 365 PSA Setup and User Guide

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Gold Cloud Customer Relationship Management
Gold Cloud Platform
Gold Data Analytics
Gold Application Development

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Microsoft Dynamics 365 PSA (Project Service Automation)

Microsoft Dynamics 365 PSA provides Project Managers and other stakeholders, the ability to manage the entire Professional Services Project lifecycle within Dynamics 365. It also allows for a deeper collaboration between Sales and Project Management.

This document is Part 1 of a 4-part series to setup Dynamics 365 PSA and leverage its capabilities for delivery of your professional services projects.

PSA Installation

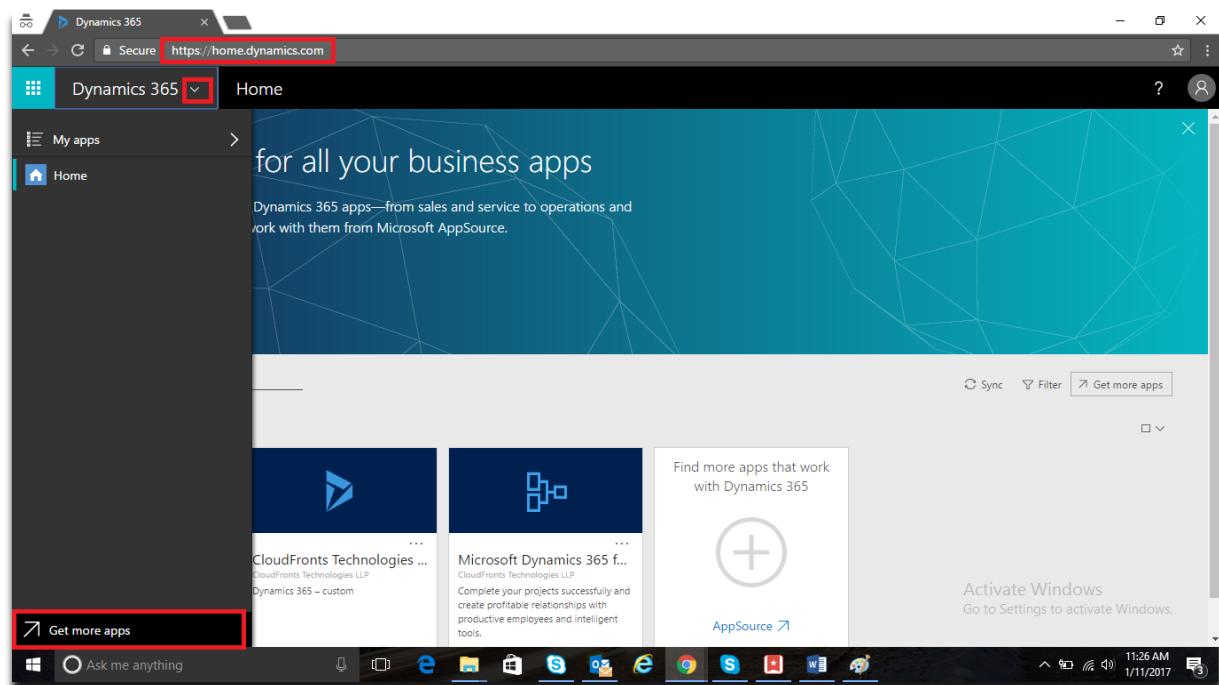
Follow the steps to install MS PSA on MS D365 Environment:

Step 1:

Login to [home.dynamics.com](https://homedynamics.com) with your credentials.

Step 2:

Click on Get more apps

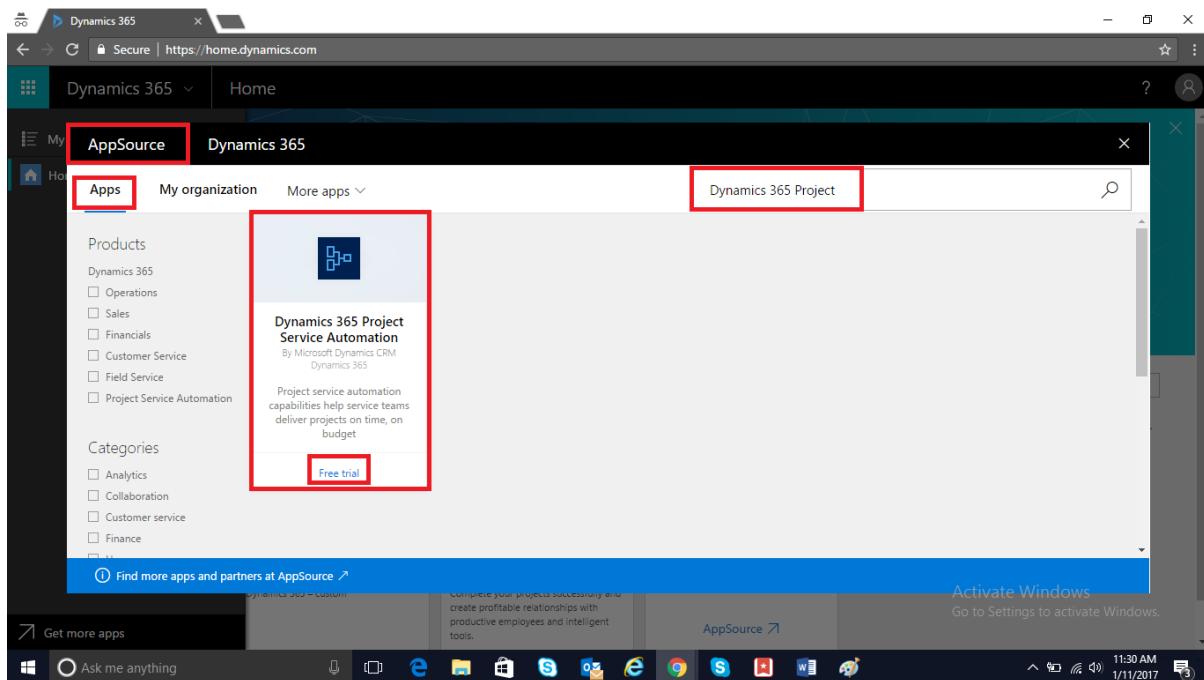


Step 3:

This will open AppSource. Select Apps and type "Dynamics 365 Project" and hit search.

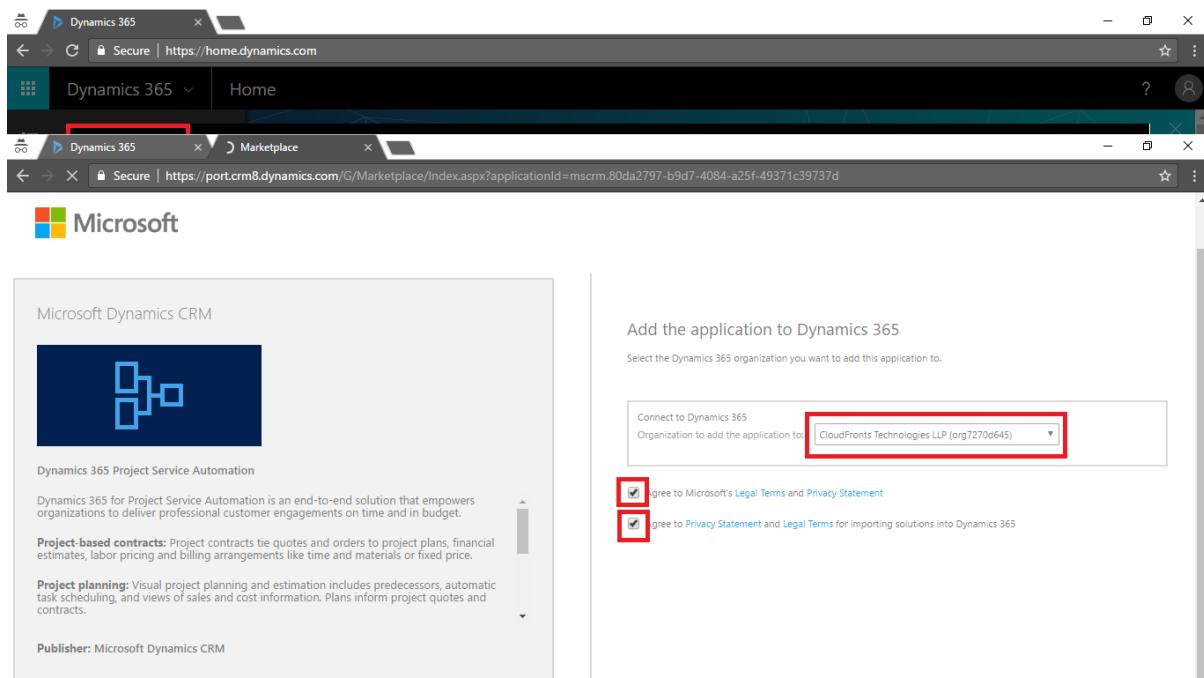
You shall see Dynamics 365 Project Service Automation in the search result.

Hit on "Free Trial" button.



It will ask the Organization details on which it needs to be installed.

Select the Organization and agree on the terms and conditions.



Step 4:

You can see Project Services Automation installed below.

Manage your solutions

Select a preferred solution to manage on selected instance: CloudFronts Technologies LLP

SOLUTION NAME	VERSION	AVAILABLE UNTIL	STATUS
Community Portal	8.2.0.260	1/1/2050	Not installed
Company News Timeline	1.0.0.0	12/31/2050	Not installed
Custom portal	8.2.0.260	1/1/2050	Not installed
Customer Self-Service Portal	8.1.2.28	1/1/2050	Upgrade available
Dynamics 365 Customer S...	1.0	1/1/2050	Not installed
Dynamics 365 Sales Appli...	1.0	1/1/2050	Installed
Employee Self-Service Por...	8.2.0.260	1/1/2050	Not installed
FantasySalesTeam	1.4.6	1/1/2050	Not installed
Field Service	6.1.0.1462	1/1/2050	Not installed
Gamification	2016.12.2	1/1/2050	Not installed
Office 365 Groups	2.6.0.0	1/1/2050	Installed
Partner Field Service	8.2.0.260	1/1/2050	Not installed
Partner Portal	8.2.0.260	1/1/2050	Not installed
Partner Project Service	8.2.0.260	1/1/2050	Not installed
Project Service Automation	1.1.0.62	1/1/2050	Installed

Community Portal

INSTALLED

Community portal leverages peer-to-peer interactions between customers and experts to organically grow the catalog of available knowledge from knowledge base articles, forums and blogs as ... (more)

Created by: Microsoft [Learn more](#)

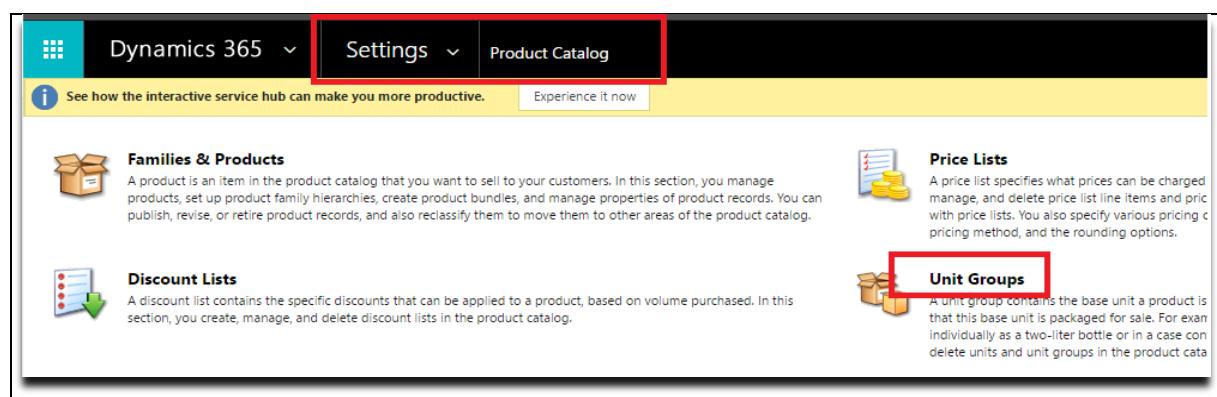
Project services basic parameter settings:

To start using the product, we need to do basic parameter settings. We need to be very careful while doing these parameter settings as they have impact on each stage of project life cycle. These are 1 time settings after the product is bought.

Following are the parameter settings that needs to be done.

Setting up time unit

- (Settings → Product Catalog → Unit group → Time)



Families & Products
 A product is an item in the product catalog that you want to sell to your customers. In this section, you manage products, set up product family hierarchies, create product bundles, and manage properties of product records. You can publish, revise, or retire product records, and also reclassify them to move them to other areas of the product catalog.

Discount Lists
 A discount list contains the specific discounts that can be applied to a product, based on volume purchased. In this section, you create, manage, and delete discount lists in the product catalog.

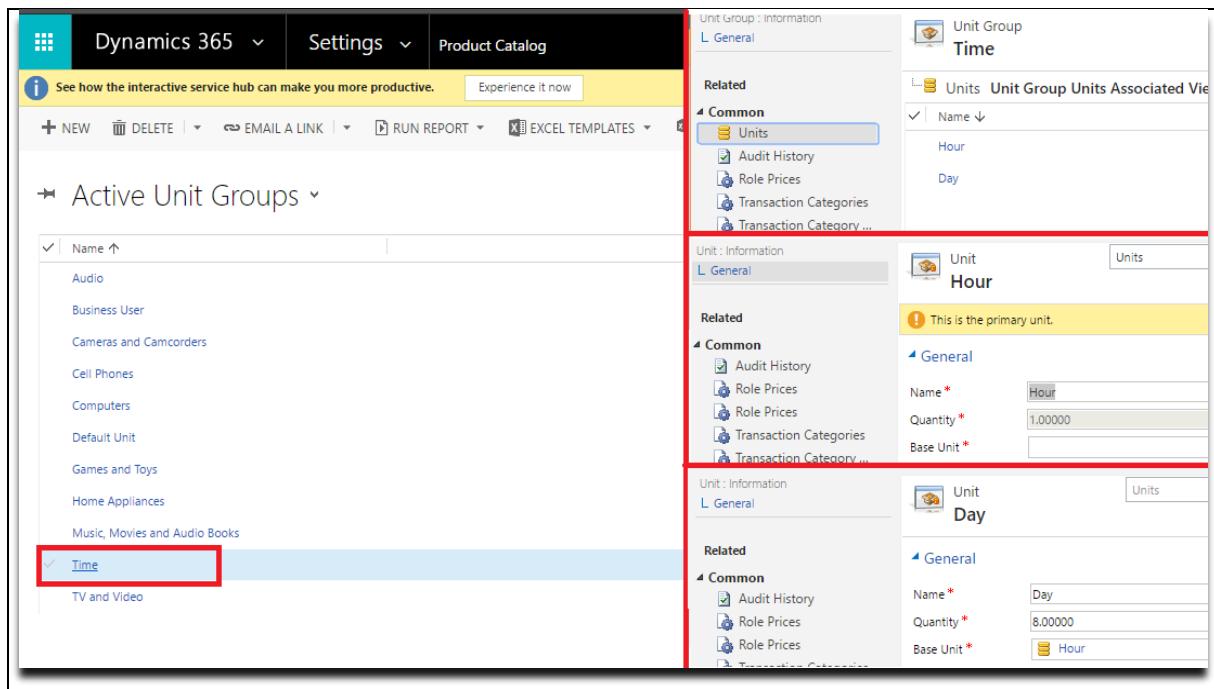
Price Lists
 A price list specifies what prices can be charged, manage, and delete price list line items and price with price lists. You also specify various pricing conditions, pricing method, and the rounding options.

Unit Groups
 A unit group contains the base unit a product is packaged for sale. For example, a product might be individually as a two-liter bottle or in a case containing four bottles. You can manage, create, and delete unit groups in the product catalog.

Select Unit group Time

Add units:

- Time
- Day



The screenshot shows the Dynamics 365 Settings interface under Product Catalog. On the left, a list of Active Unit Groups is displayed, with 'Time' highlighted and a red box drawn around it. On the right, the 'Unit Group Time' configuration page is open, showing three units: Hour, Day, and Unit. The Hour unit is marked as the primary unit.

Active Unit Groups

- Audio
- Business User
- Cameras and Camcorders
- Cell Phones
- Computers
- Default Unit
- Games and Toys
- Home Appliances
- Music, Movies and Audio Books
- Time** (highlighted with a red box)
- TV and Video

Unit Group : Information

L General

Related

Common

- Units
- Audit History
- Role Prices
- Transaction Categories
- Transaction Category ...

Unit : Information

L General

Related

Common

- Audit History
- Role Prices
- Role Prices
- Transaction Categories
- Transaction Category ...

Unit Group Time

L Units

Units

Related

Common

- Units
- Audit History
- Role Prices
- Role Prices
- Transaction Categories
- Transaction Category ...

Unit

Hour

General

Name * Hour

Quantity * 1.00000

Base Unit *

Unit

Day

General

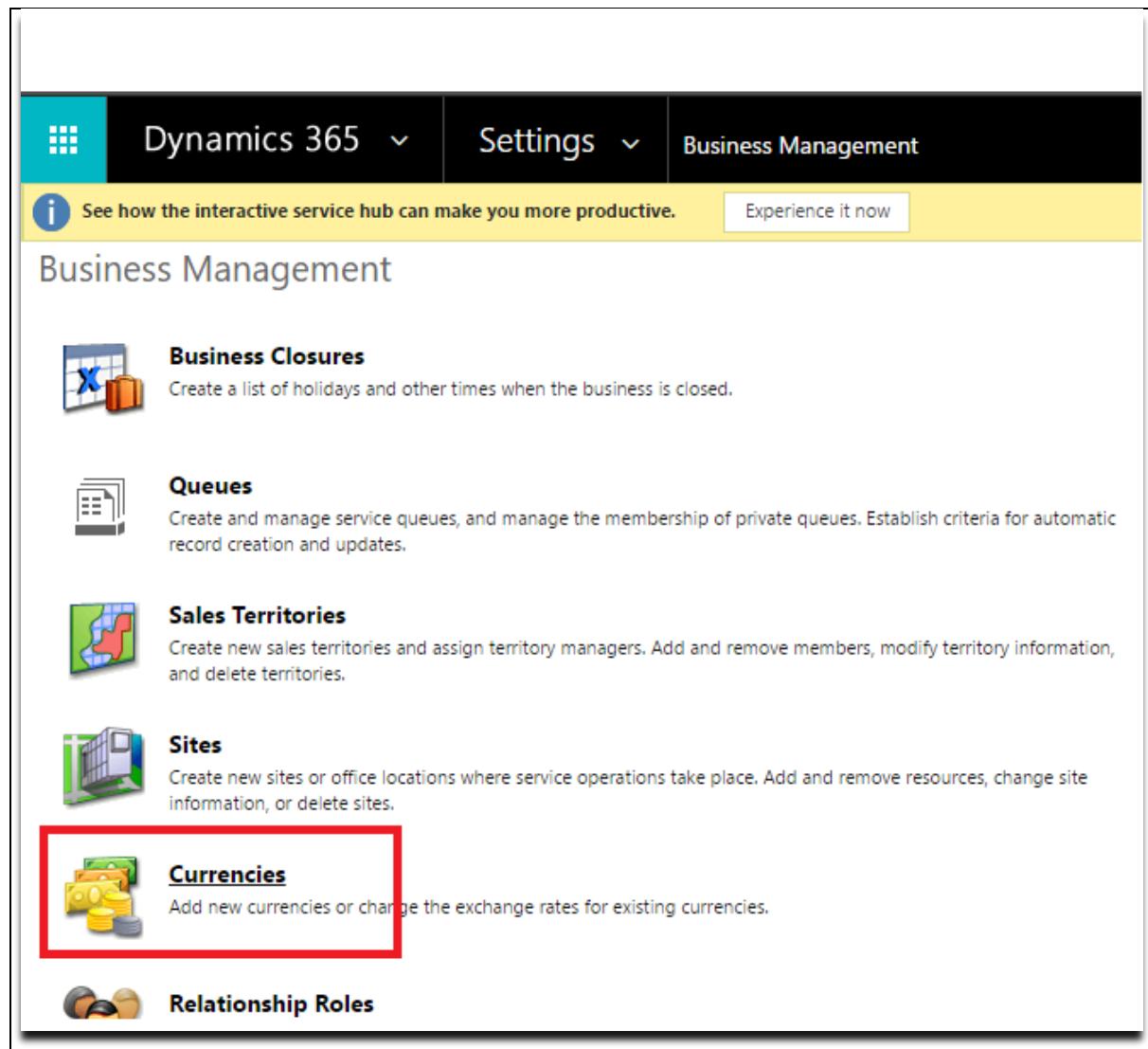
Name * Day

Quantity * 8.00000

Base Unit * Hour

2. Currency & Exchange Rate

a. (Settings → Business Mgmt. → Currencies)



Dynamics 365 | **Settings** | **Business Management**

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Business Management

- Business Closures**
Create a list of holidays and other times when the business is closed.
- Queues**
Create and manage service queues, and manage the membership of private queues. Establish criteria for automatic record creation and updates.
- Sales Territories**
Create new sales territories and assign territory managers. Add and remove members, modify territory information, and delete territories.
- Sites**
Create new sites or office locations where service operations take place. Add and remove resources, change site information, or delete sites.
- Currencies**
Add new currencies or change the exchange rates for existing currencies.
- Relationship Roles**

Set below 5 values for each of the currencies that you add:

1. Currency Name
2. Currency Code
3. Currency Symbol
4. Exchange Rate
5. Currency Precision

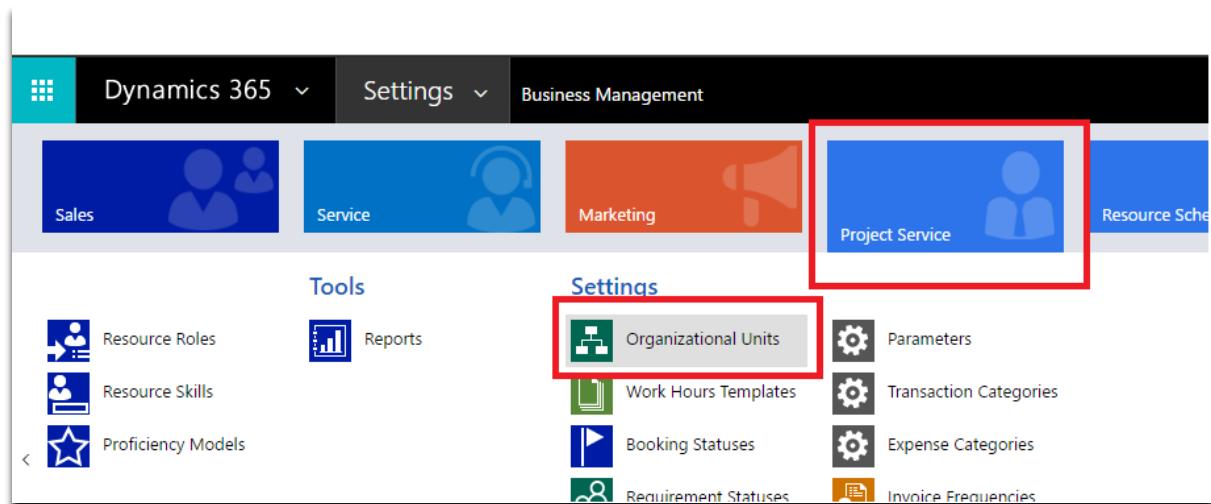
Currencies

View: Active Currencies

Currency Name ↑	Currency Code	Currency Symbol	Exchange Rate	Currency Precision
Australian Dollar	AUD	\$	0.7232200000	2
Canadian Dollar	CAD	\$	1.3332000000	2
Dansk krone	DKK	kr.	7.0645900000	2
Euro	EUR	€	0.9467650000	2
Norsk krone	NOK	kr	0.1149690000	2
Peso	MXN	\$	16.5990000000	2
Pound Sterling	GBP	£	0.6646550000	2

Organizational Unit

b. (Project Services → Organizational units)

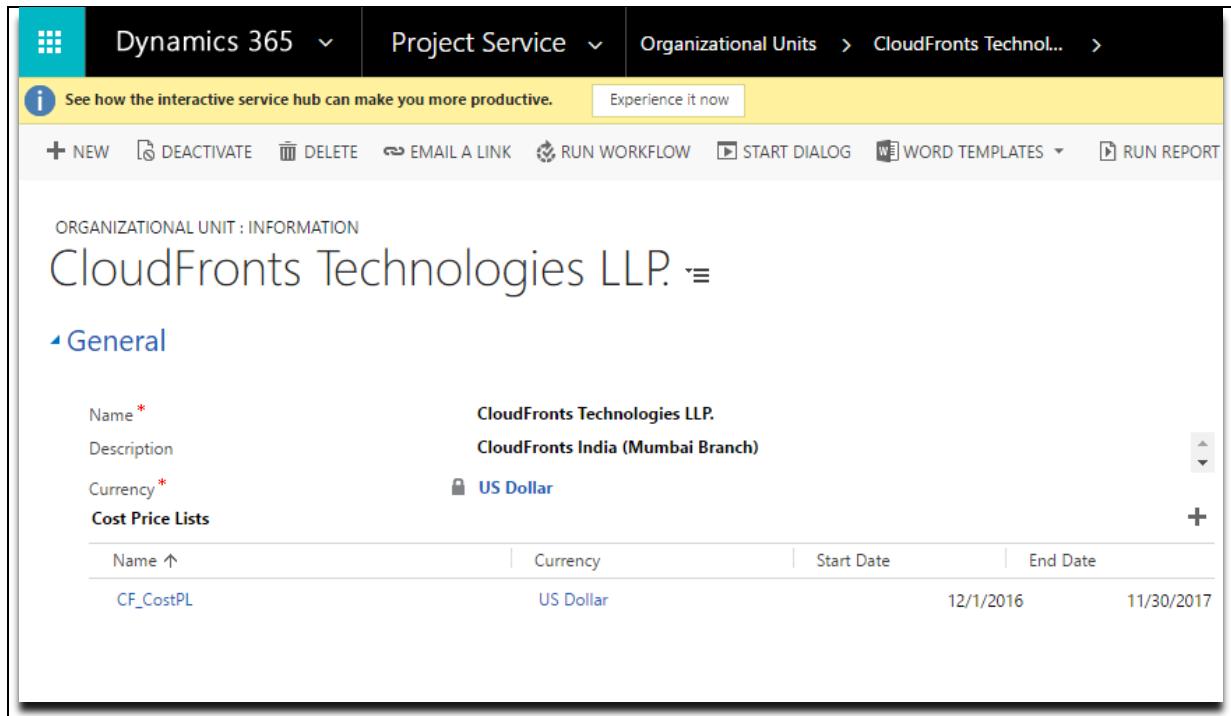


Organizational Unit in Project services is different than the Organizational Unit in D365 CRM.

Here the Organizational Unit can be a geographical location or a branch of the office.

Each Organizational Unit needs to be tagged with a Cost Price List. This is to calculate the costing for that organizational Unit, which ultimately leads us to profitability.

We shall see how to set up price list in [Product Catalog Item](#).



Dynamics 365 Project Service Organizational Units > CloudFronts Technol... >

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+ NEW DEACTIVATE DELETE EMAIL A LINK RUN WORKFLOW START DIALOG WORD TEMPLATES RUN REPORT

ORGANIZATIONAL UNIT : INFORMATION

CloudFronts Technologies LLP

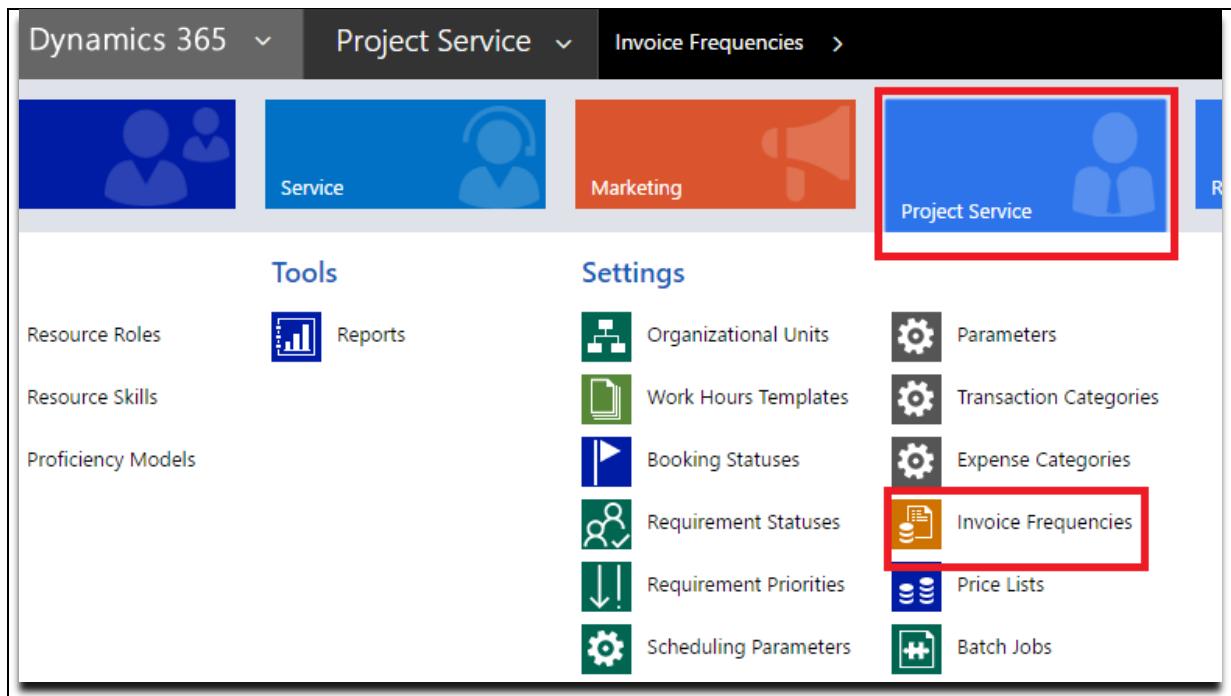
General

Name *	CloudFronts Technologies LLP.		
Description	CloudFronts India (Mumbai Branch)		
Currency *	US Dollar		
Cost Price Lists			
Name ↑	Currency	Start Date	End Date
CF_CostPL	US Dollar	12/1/2016	11/30/2017

Invoice Frequencies

c. (Project Services → Invoicing Frequencies)

Invoicing frequencies determine, in what interval to bill the client.



Dynamics 365 Project Service Invoice Frequencies >

Service Marketing Project Service

Tools Settings

Resource Roles	Reports	Organizational Units	Parameters
Resource Skills		Work Hours Templates	Transaction Categories
Proficiency Models		Booking Statuses	Expense Categories
		Requirement Statuses	Invoice Frequencies
		Requirement Priorities	Price Lists
		Scheduling Parameters	Batch Jobs

Basically, PSA offers the following 4 Invoicing frequencies that you can set-up as per your need.

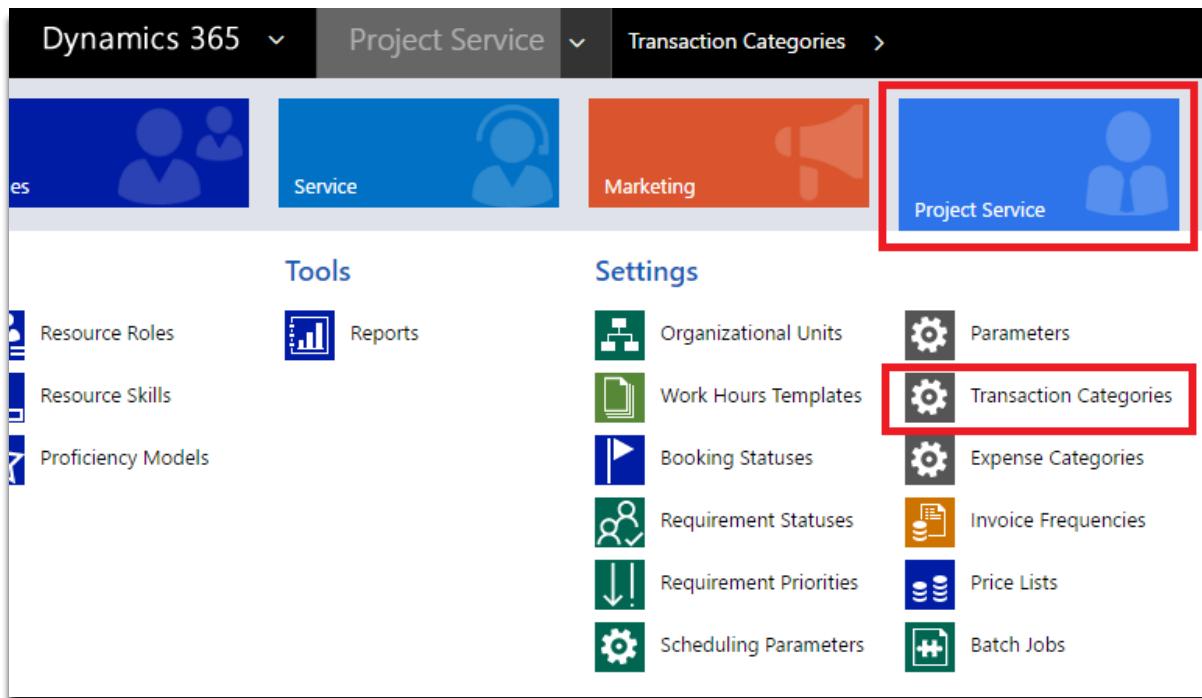
→ Active Invoice Frequencies ▾

Name ↑	Created On
Bi-Monthly	12/15/2016 10:51 AM
End of Month	12/27/2016 5:28 PM
Monthly	12/15/2016 10:50 AM
Weekly	12/15/2016 10:51 AM

Transaction Categories

d. (Project Services → Transaction Categories)

Transaction Categories are nothing but a 'superset' of expense categories. For example, Expense categories are Domestic Airtravel, International Airtravel. The Transaction category would be Air Travel.



The screenshot shows the Dynamics 365 Project Service settings page. The top navigation bar has tabs for 'Dynamics 365', 'Project Service', and 'Transaction Categories'. The 'Project Service' tab is selected. The main content area is divided into 'Tools' and 'Settings' sections. Under 'Tools', there are links for 'Resource Roles', 'Resource Skills', and 'Proficiency Models'. Under 'Settings', there are links for 'Reports', 'Organizational Units', 'Work Hours Templates', 'Booking Statuses', 'Requirement Statuses', 'Requirement Priorities', 'Scheduling Parameters', 'Parameters', 'Expense Categories', 'Invoice Frequencies', 'Price Lists', and 'Batch Jobs'. A red box highlights the 'Project Service' button in the top navigation bar and the 'Transaction Categories' link in the 'Settings' section.

Below is the example of “Time” Transaction Category:

TRANSACTION CATEGORY & INFORMATION

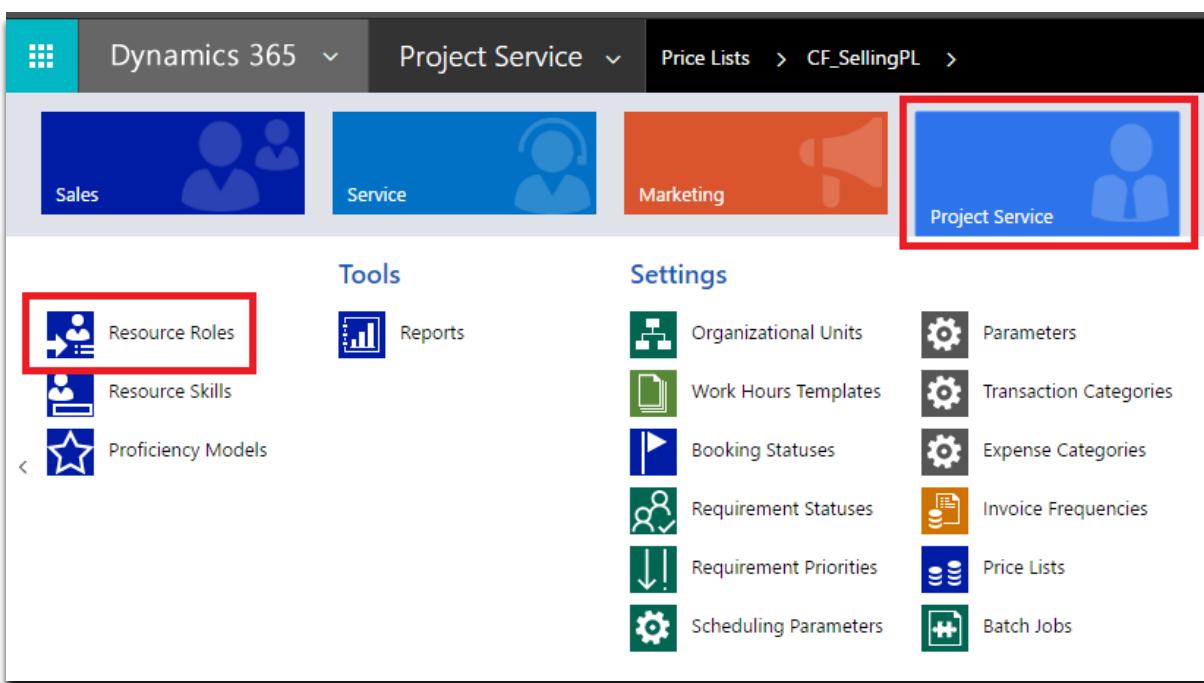
Time

General

Name *	Time
Unit Group	Time
Default Unit	Hour
Billing Type	Chargeable

Add Resource Roles:

e. (Project Services → Resource Roles)



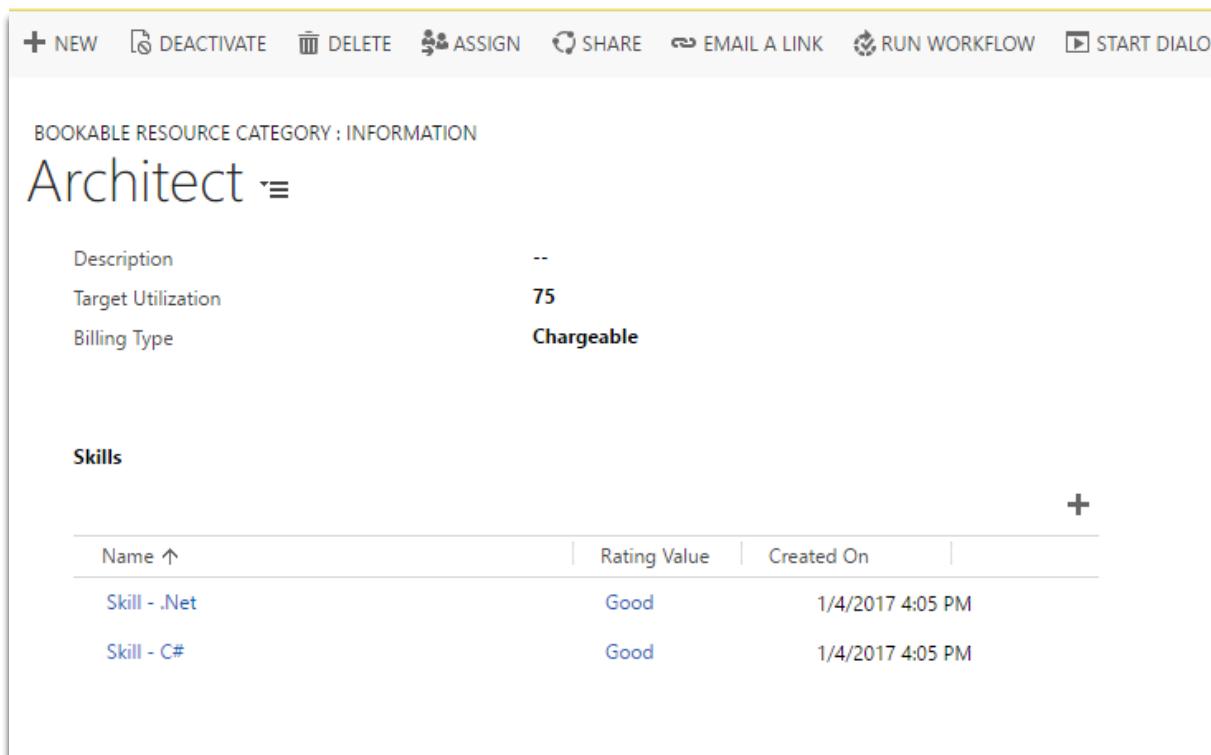
The screenshot shows the Dynamics 365 Project Service interface. The top navigation bar includes 'Dynamics 365', 'Project Service', 'Price Lists', and 'CF_SellingPL'. Below the navigation is a horizontal bar with four colored boxes: Sales (blue), Service (light blue), Marketing (orange), and Project Service (light blue, highlighted with a red box). The main content area is divided into 'Tools' and 'Settings'. The 'Tools' section contains 'Resource Roles' (highlighted with a red box), 'Resource Skills', and 'Proficiency Models'. The 'Settings' section contains 'Organizational Units', 'Work Hours Templates', 'Booking Statuses', 'Requirement Statuses', 'Requirement Priorities', 'Scheduling Parameters', 'Parameters', 'Transaction Categories', 'Expense Categories', 'Invoice Frequencies', 'Price Lists', and 'Batch Jobs'.

Resource Roles are nothing but, Roles defined in an organization. For e.g. a Software consultancy firm might have following Roles:

1. Architect.
2. Project Manager
3. Sr. Developer
4. Developer, Etc.

Publish the roles after creating them. Each Role can be tagged with Multiple skills while creating them. For e.g. a Sr. Developer might have following skill set:

1. .Net
2. C#
3. MVC
4. CRM
5. JavaScript, etc.



BOOKABLE RESOURCE CATEGORY : INFORMATION

Architect

Description --

Target Utilization 75

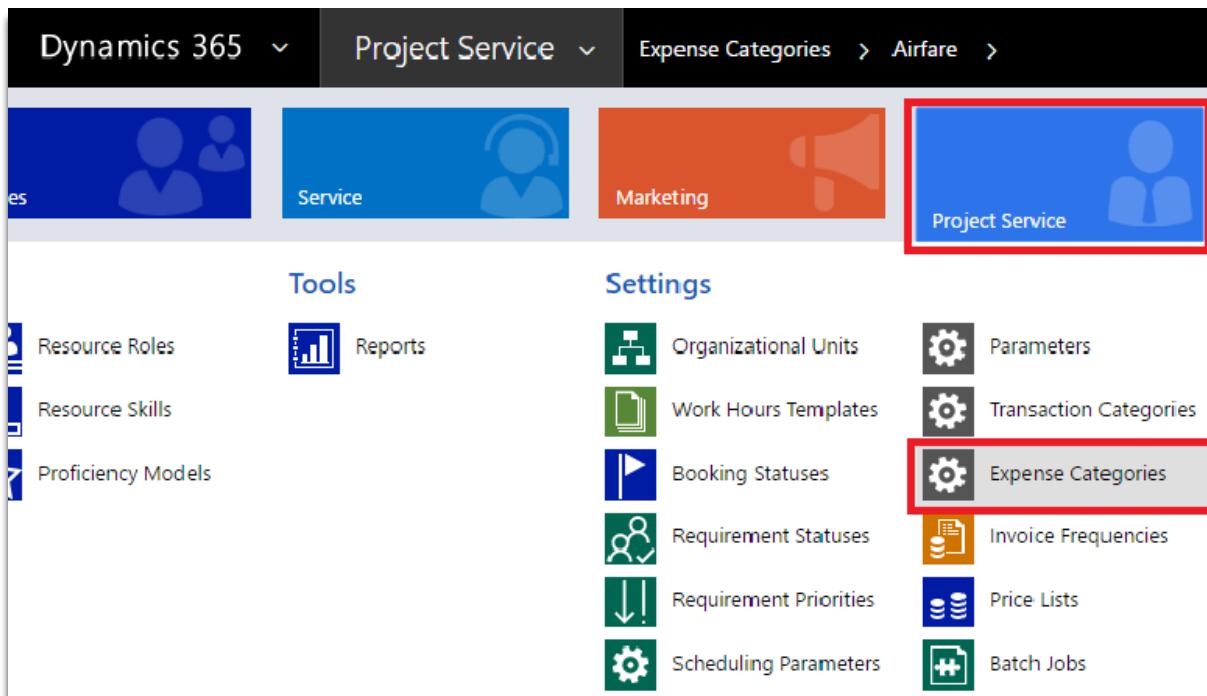
Billing Type Chargeable

Skills

Name ↑	Rating Value	Created On
Skill - .Net	Good	1/4/2017 4:05 PM
Skill - C#	Good	1/4/2017 4:05 PM

3. Expense Categories

- a. (Project Services → Expense Categories)



Dynamics 365 Project Service Expense Categories > Airfare >

Project Service

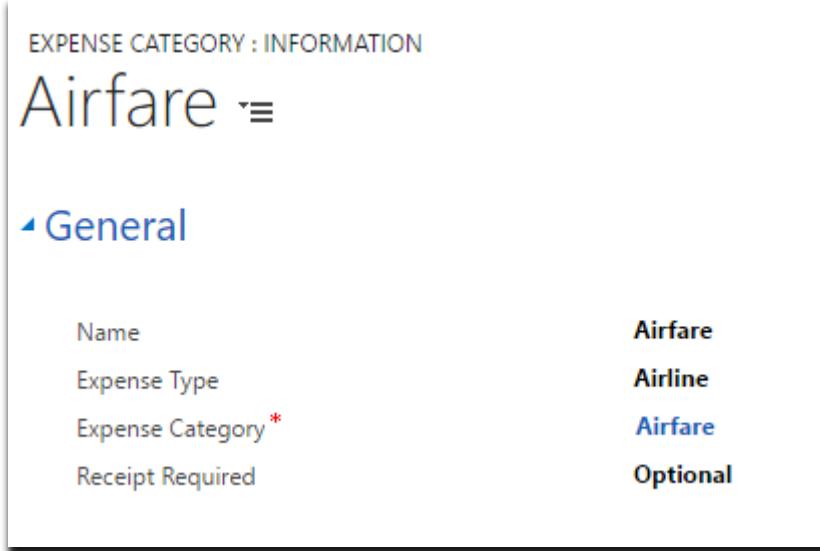
Tools

- Resource Roles
- Resource Skills
- Proficiency Models

Settings

- Organizational Units
- Work Hours Templates
- Booking Statuses
- Requirement Statuses
- Requirement Priorities
- Scheduling Parameters
- Parameters
- Transaction Categories
- Expense Categories
- Invoice Frequencies
- Price Lists
- Batch Jobs

Below is the example of “Airfare” Expense Category:



EXPENSE CATEGORY : INFORMATION

Airfare

General

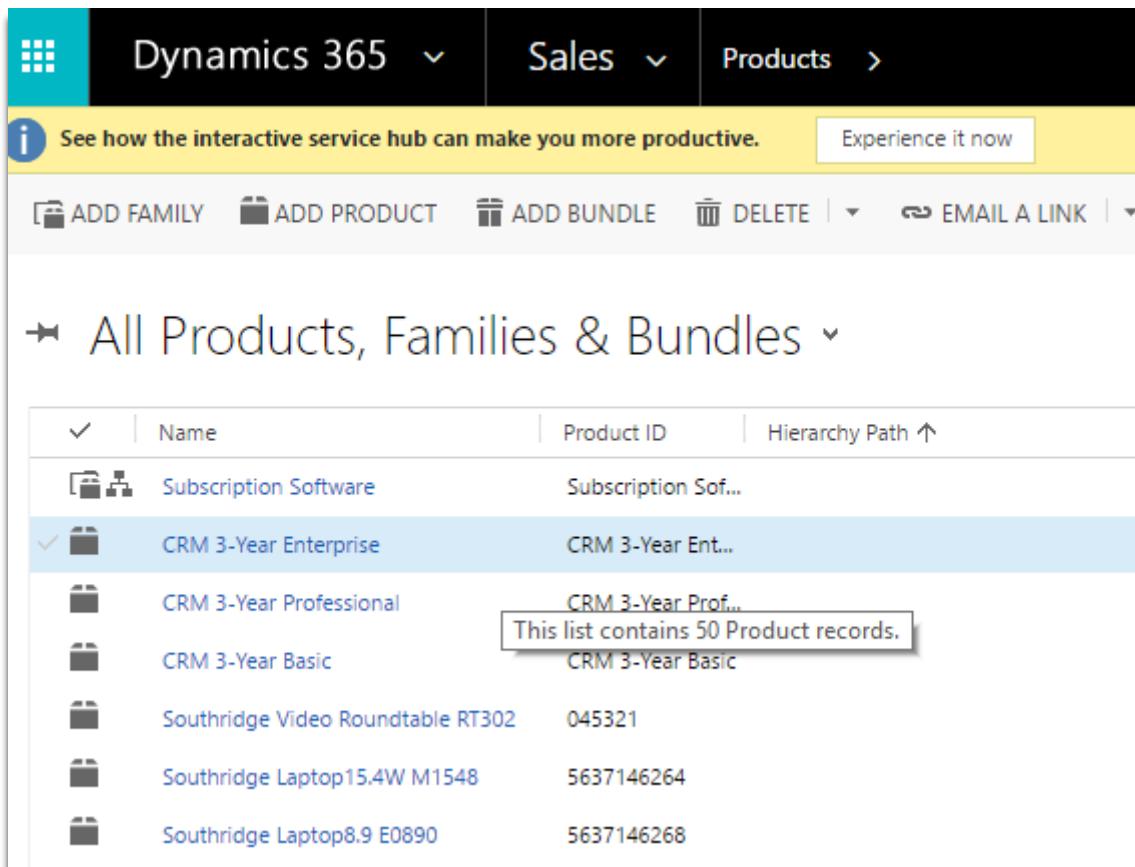
Name	Airfare
Expense Type	Airline
Expense Category*	Airfare
Receipt Required	Optional

Product Catalog Item

Before setting up a product Catalog we need to do product set up which can be later added to the Price Lists (Catalog's).

You can either create a Product or Create a Product Family and add products in that.

You can do that by Navigating to Sales→ Products



See how the interactive service hub can make you more productive. [Experience it now](#)

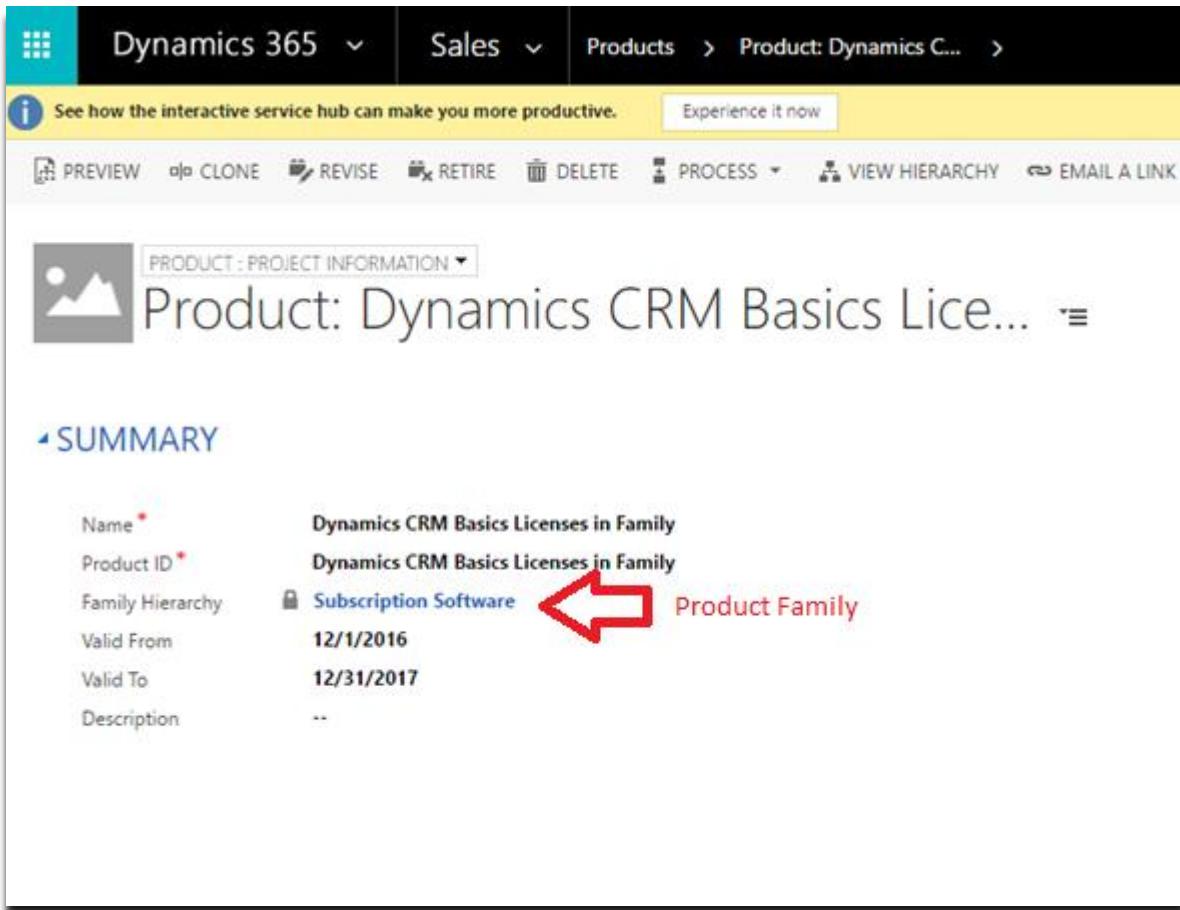
ADD FAMILY ADD PRODUCT ADD BUNDLE DELETE EMAIL A LINK

All Products, Families & Bundles

✓	Name	Product ID	Hierarchy Path ↑
	Subscription Software	Subscription Sof...	
	CRM 3-Year Enterprise	CRM 3-Year Ent...	
	CRM 3-Year Professional	CRM 3-Year Prof...	
	CRM 3-Year Basic	CRM 3-Year Basic	This list contains 50 Product records.
	Southridge Video Roundtable RT302	045321	
	Southridge Laptop15.4W M1548	5637146264	
	Southridge Laptop8.9 E0890	5637146268	

Make sure you publish the product after creating them.

If you want to add a product to a product family then, add the family hierarchy to the product family that you have created as shown below.

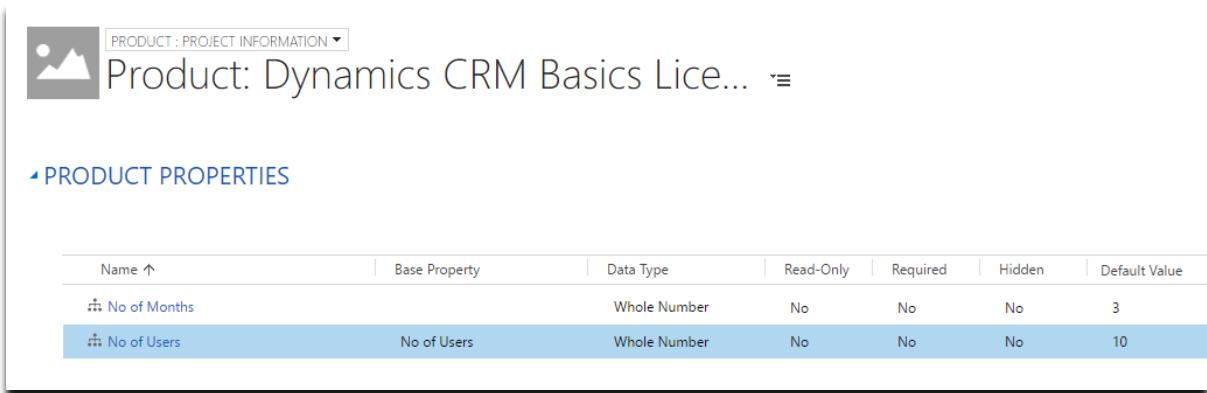


The screenshot shows the Dynamics 365 Sales interface. The top navigation bar includes 'Dynamics 365', 'Sales', 'Products', and a breadcrumb trail 'Product: Dynamics C...'. A yellow banner at the top says 'See how the interactive service hub can make you more productive.' with a 'Experience it now' button. The main content area is titled 'PRODUCT : PROJECT INFORMATION' and shows a thumbnail image. The product name is 'Product: Dynamics CRM Basics License...'. Below this, the 'SUMMARY' section displays the following details:

Name *	Dynamics CRM Basics Licenses in Family
Product ID *	Dynamics CRM Basics Licenses in Family
Family Hierarchy	Subscription Software 
Valid From	12/1/2016
Valid To	12/31/2017
Description	--

To leverage OOB CRM for PSA, we can now define the product properties too.

These properties can be defined as per below:



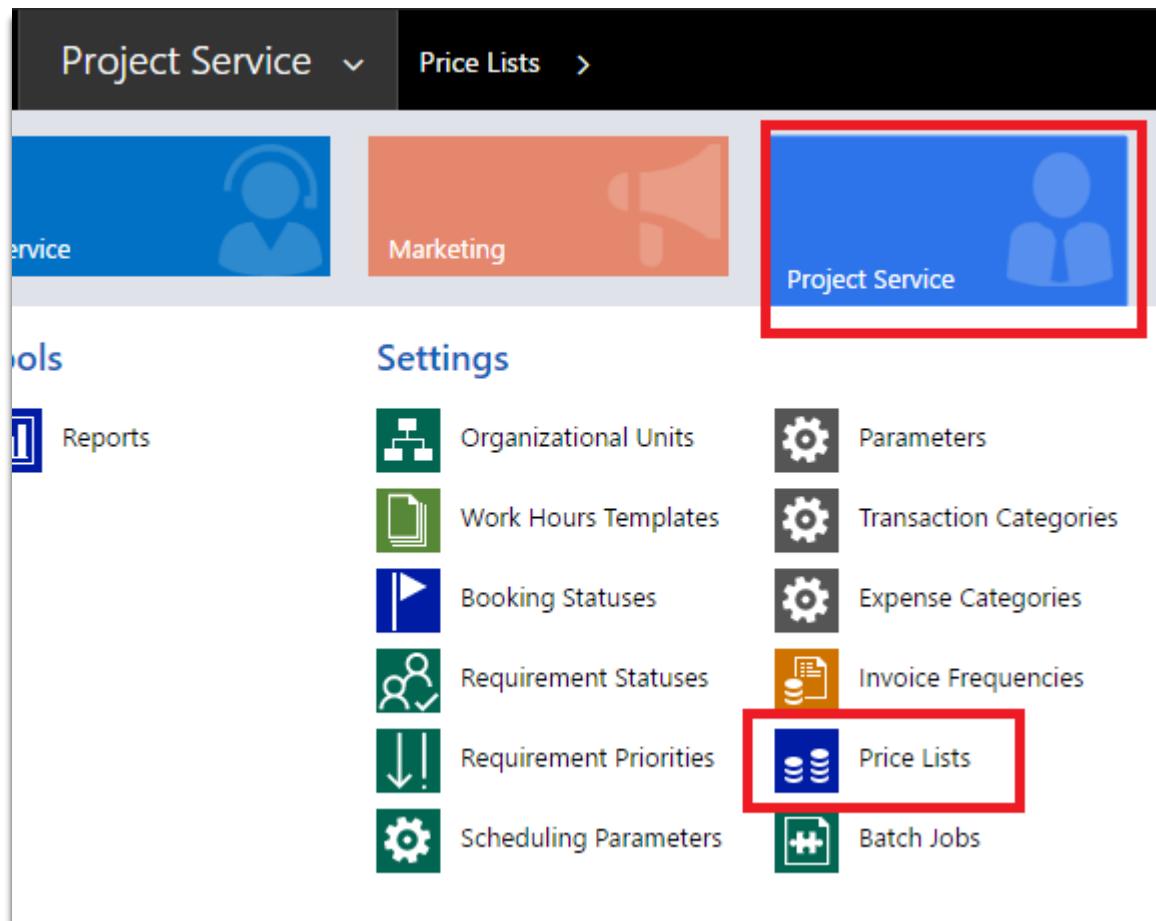
The screenshot shows the 'PRODUCT PROPERTIES' section for the same product. It displays a table with the following columns: Name, Base Property, Data Type, Read-Only, Required, Hidden, and Default Value. The table contains two rows:

Name	Base Property	Data Type	Read-Only	Required	Hidden	Default Value
No of Months		Whole Number	No	No	No	3
No of Users	No of Users	Whole Number	No	No	No	10

Once the product setup is completed, we can move towards creating the price lists.

PSA leverages OOB Pricelist entity by adding a field called "Context". It has 2 values, "Sales" and "Cost". Sales means the defined price list will be a Sales Price list and Cost, means the defined price list shall be a Cost Price list.

For creating a price list, navigate as shown below:



Project Service > Price Lists >

Service Marketing Project Service

Tools Settings

Reports	Organizational Units	Parameters
	Work Hours Templates	Transaction Categories
	Booking Statuses	Expense Categories
	Requirement Statuses	Invoice Frequencies
	Requirement Priorities	Price Lists
	Scheduling Parameters	Batch Jobs

For creating a Price List, we need to set up 6 basic things:

1. Price List Name
2. Price List validity (Start Date and End Date)
3. Currency
4. Role Prices
5. Category Prices
6. Price List Items

Role Prices

PRICE LIST : PRICELEVEL

CF_SellingPL

Name *	CF_SellingPL	Description	--
Context *	Sales		
Start Date	12/1/2016		
End Date	11/30/2017		
Currency *	US Dollar		
Time Unit	--		

► Role prices

Role ↑	Resourcing Unit	Unit	Price	Currency	Description
Developer	CloudFronts Technol...	Hour	\$100.00	US Dollar	
Developer	CloudFronts Technol...	Hour	\$100.00	US Dollar	
Project Manager	CloudFronts Technol...	Hour	\$200.00	US Dollar	

Category Prices

PRICE LIST : PRICELEVEL

CF_SellingPL

End Date	11/30/2017
Currency *	US Dollar
Time Unit	--

► Role prices

▣ Category prices

Transaction Category ↑	Unit	Price Calculation	Percent	Price	Currency	Description
Mileage	Primary Unit	At cost	0.00	\$0.00	US Dollar	
Travel	Primary Unit	Price per unit	0.00	\$0.50	US Dollar	

Price List Items

PRICE LIST : PRICELEVEL
CF_SellingPL 

- ▶ Role prices
- ▶ Category prices
- Price List Items

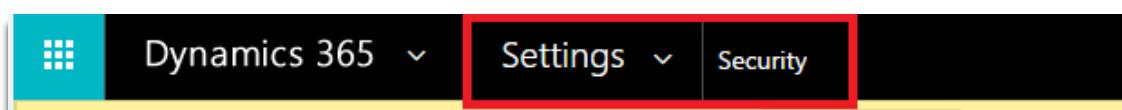
+ 

Product ↑
Dynamics 365 Enterprise Plan 1
Dynamics 365 Team Member
Dynamics CRM Basics Licenses in Family
Dynamics CRM Enterprise Licenses in Family

Create a work template

- b. (Settings → Security → Users → Work Hours)

Work hours define each users' working hour. This helps, when the resources work in shifts in an organization.



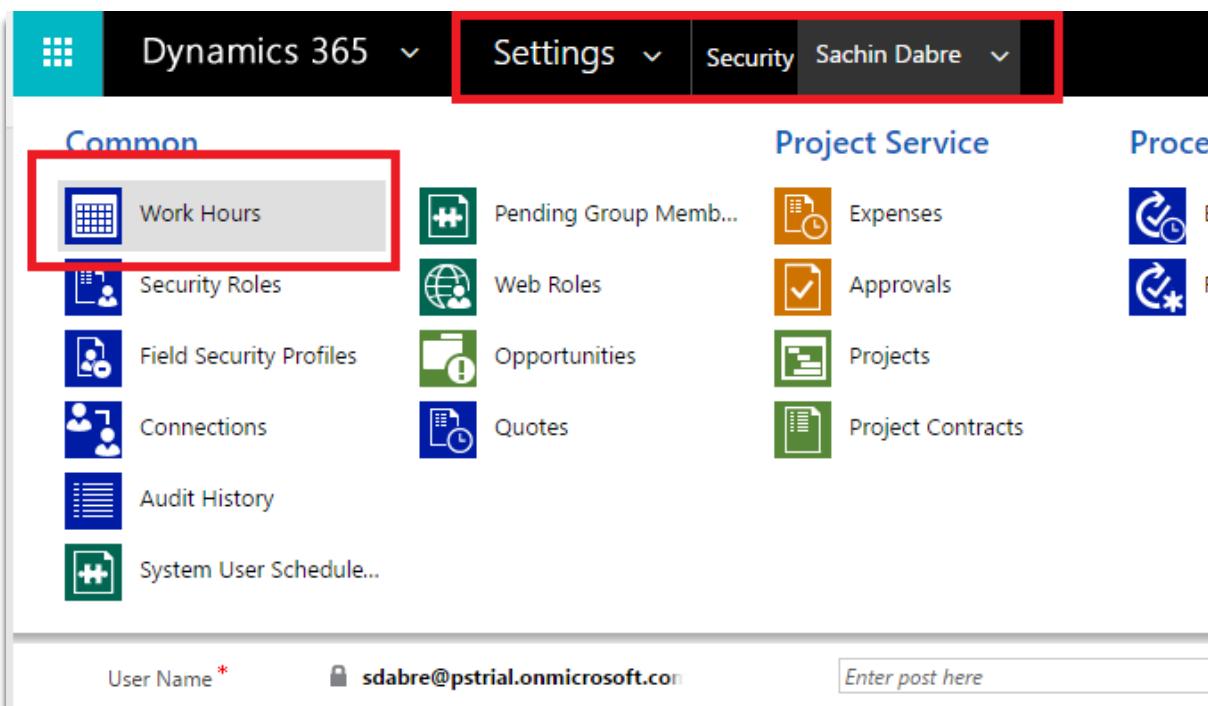
Security

Which feature would you like to work with?

Users  Add new users. Edit information about users and deactivate user records. Manage the teams, roles, and licenses assigned to users.

Security Roles  Create new security roles. Manage and delete existing security roles for your organization.

Open a user and navigate to "Work Hours".



Dynamics 365 Settings

Common

- Work Hours
- Security Roles
- Field Security Profiles
- Connections
- Audit History
- System User Schedule...

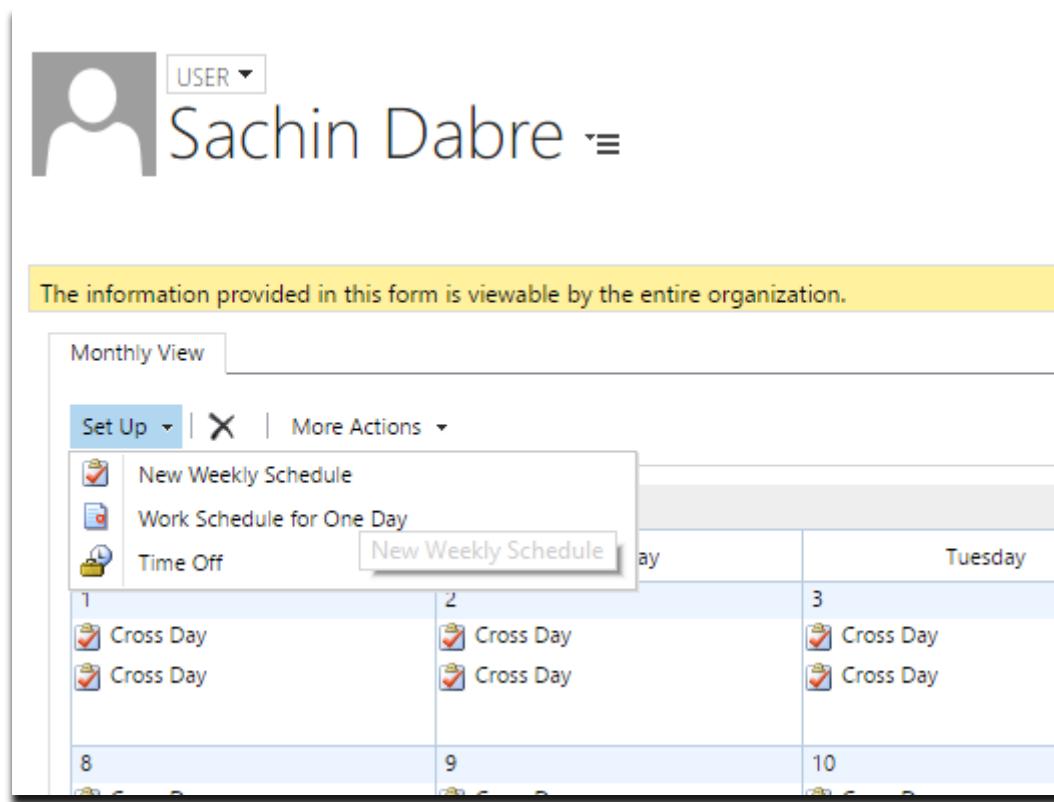
Project Service

- Pending Group Members...
- Web Roles
- Opportunities
- Quotes

- Expenses
- Approvals
- Projects
- Project Contracts

User Name * Enter post here

Click on Setup and “New Weekly Schedule”



USER

Sachin Dabre

The information provided in this form is viewable by the entire organization.

Monthly View

Set Up | X | More Actions

New Weekly Schedule

Work Schedule for One Day

Time Off

New Weekly Schedule

		Monday	Tuesday
1	Cross Day	Cross Day	
2	Cross Day	Cross Day	
8		10	

A Pop Up opens

Weekly Schedule - Microsoft Dynamics 365 - Google Chrome

Secure | https://pstrial.crm8.dynamics.com/SM/workplans/edit.aspx?calendarId=&i

Weekly Schedule

Set the recurring weekly schedule

Work Hours Are the same each day [Set Work Hours](#)
 Vary by day
 None. Resource is not working

Work Days Sun Mon Tue Wed
 Thu Fri Sat

Business Closures Observe
 Do not observe

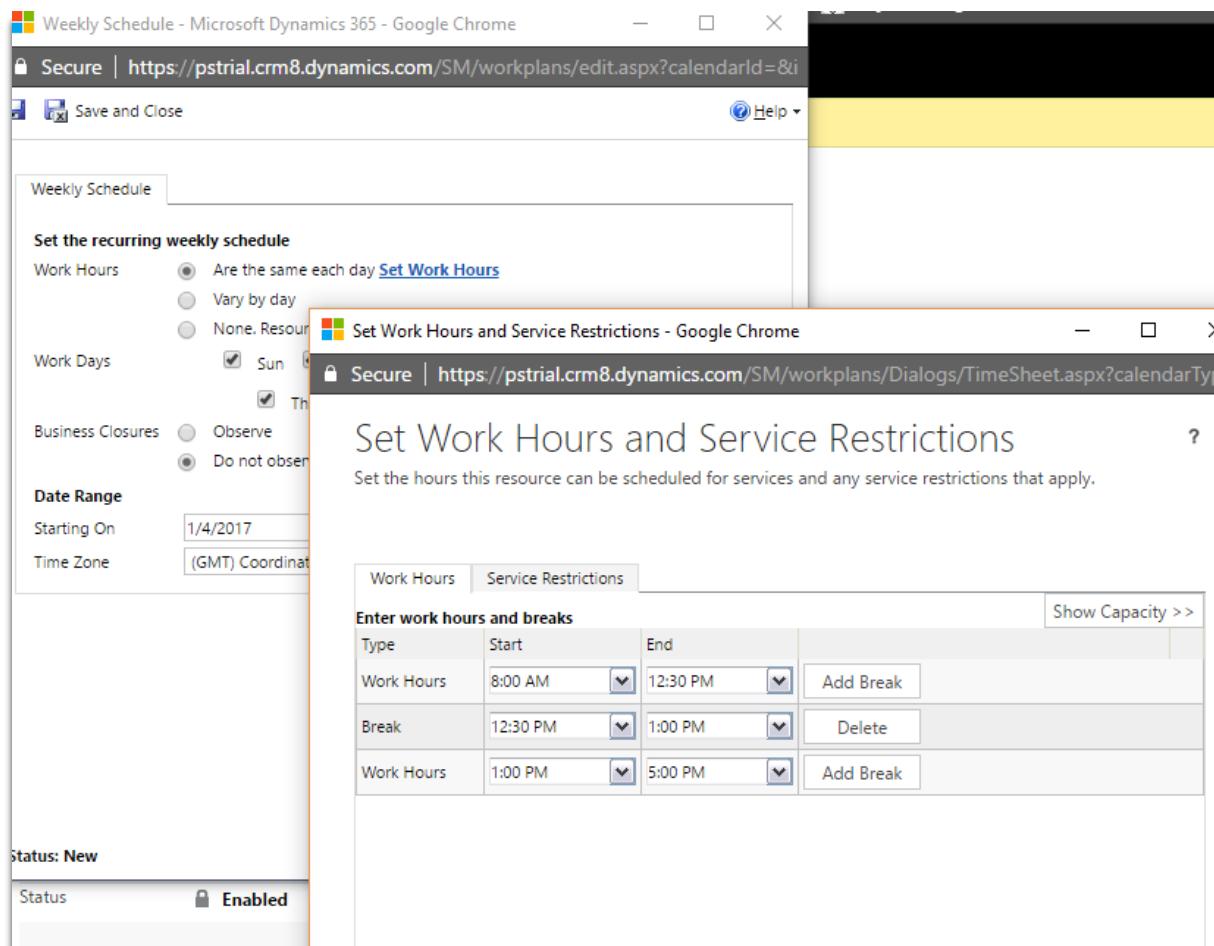
Date Range

Starting On  No End Date

Time Zone 

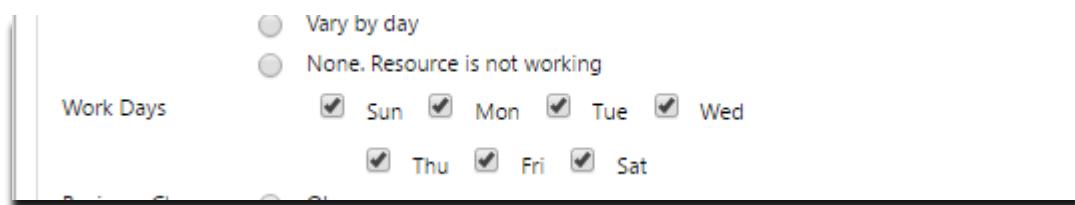
Status: New

Click on Set Work Hours, define the working hours, add break if you want and click OK.



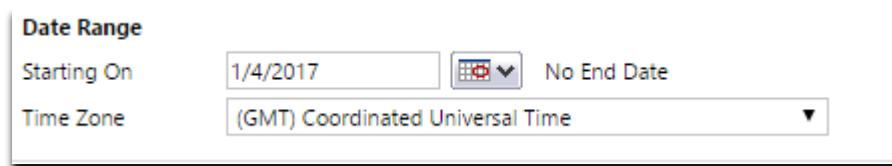
The screenshot shows the Microsoft Dynamics 365 interface for setting a weekly schedule. The main window is titled 'Weekly Schedule - Microsoft Dynamics 365 - Google Chrome'. It includes sections for 'Work Hours' (radio buttons for 'Are the same each day' and 'Vary by day'), 'Work Days' (checkboxes for Sun through Sat), 'Business Closures' (radio buttons for 'Observe' and 'Do not observe'), and a 'Date Range' section with 'Starting On' (1/4/2017) and 'Time Zone' (GMT Coordinated Universal Time). A status bar at the bottom indicates 'Status: New' and 'Status Enabled'. A secondary window titled 'Set Work Hours and Service Restrictions - Microsoft Dynamics 365 - Google Chrome' is overlaid, showing a table for entering work hours and breaks. The table has columns for Type (Work Hours, Break, Work Hours), Start, End, and actions (Add Break, Delete). The 'Work Hours' row shows 8:00 AM to 12:30 PM and 1:00 PM to 5:00 PM.

Select the “No of Days” the resource works in a Day.



The screenshot shows the 'Work Days' section of the weekly schedule configuration. It includes radio buttons for 'Vary by day' and 'None. Resource is not working', and checkboxes for each day of the week (Sun through Sat). All days are currently checked.

Set the “Starting On” and “Time Zone” in which the user works:

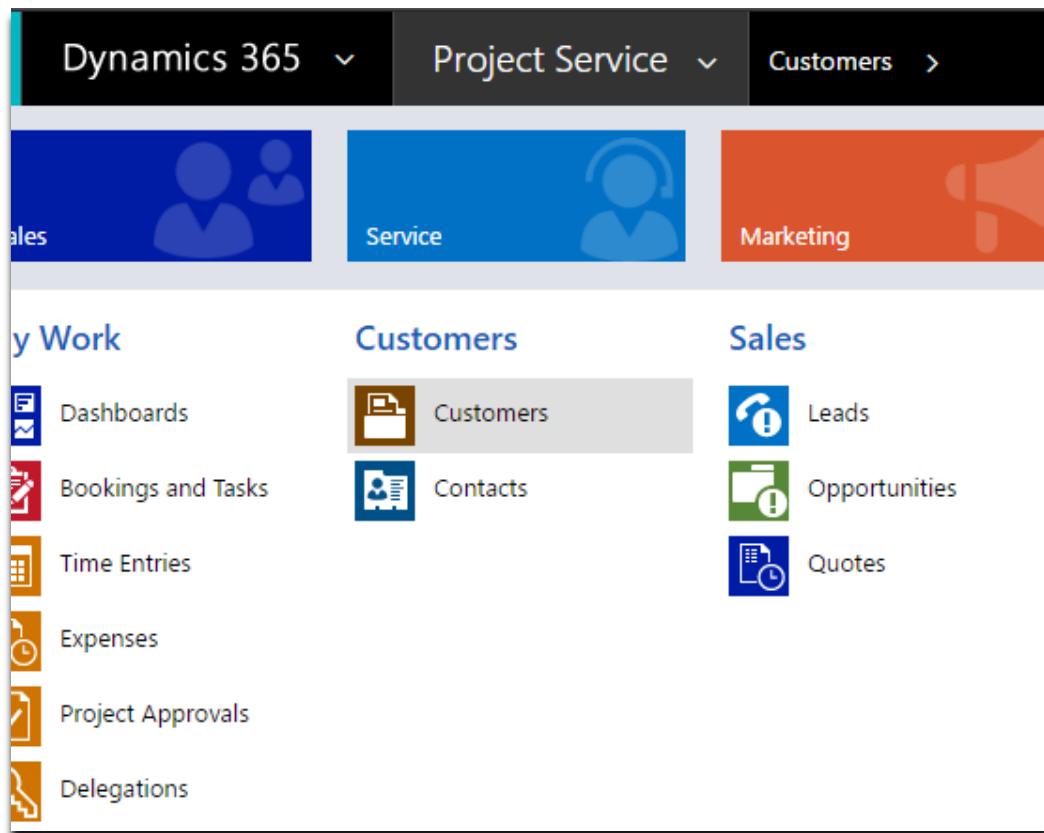


The screenshot shows the 'Date Range' section. It includes a 'Starting On' field set to 1/4/2017 and a 'Time Zone' field set to (GMT) Coordinated Universal Time.

Create a customer

- c. (Project Services → customer)

Before we head towards creating a project, we should have Customers (Accounts) in the system.



Dynamics 365 > Project Service > Customers >

Sales Service Marketing

My Work Customers Sales

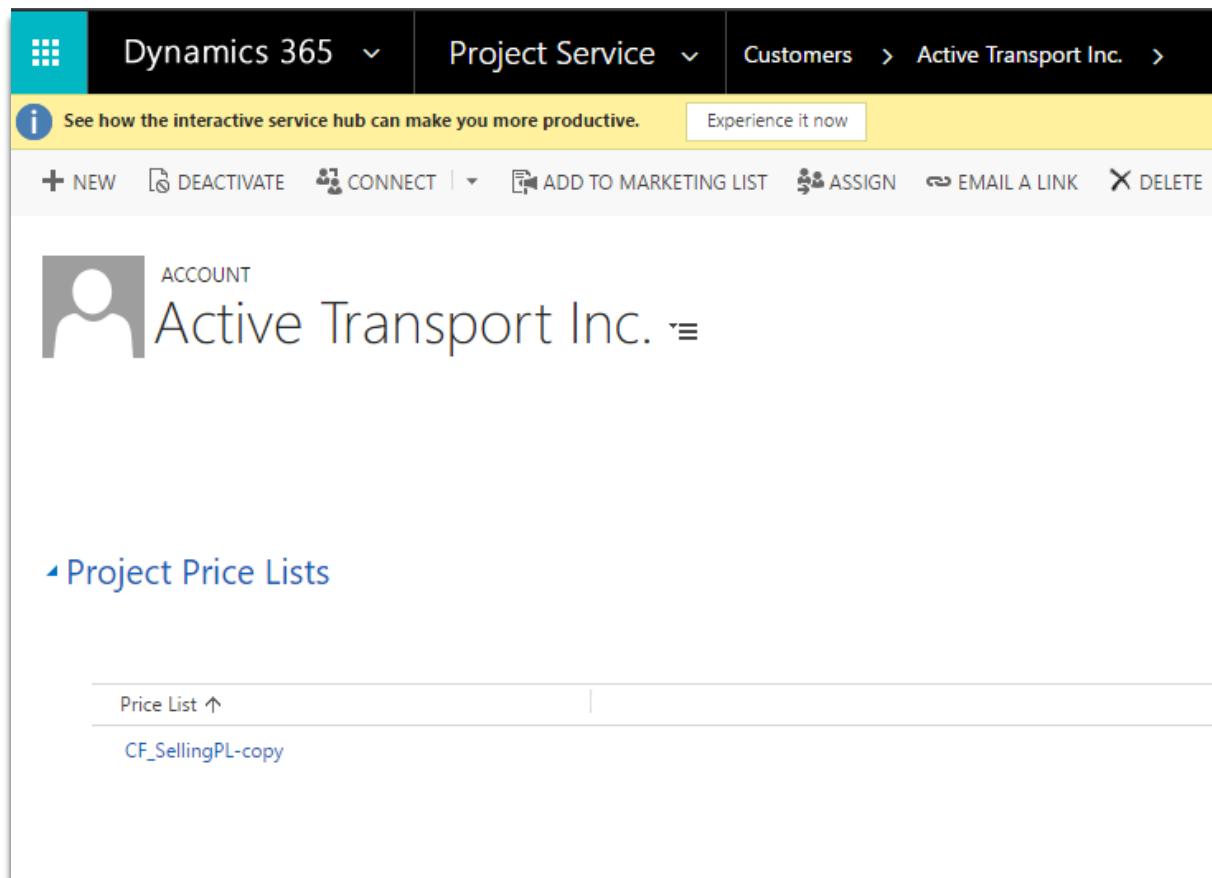
- Dashboards
- Bookings and Tasks
- Time Entries
- Expenses
- Project Approvals
- Delegations

Customers

- Customers
- Contacts

Leads Opportunities Quotes

Once you create a new customer you can tag a default price list against a customer.



Dynamics 365 > Project Service > Customers > Active Transport Inc. >

See how the interactive service hub can make you more productive. Experience it now

NEW DEACTIVATE CONNECT ADD TO MARKETING LIST ASSIGN EMAIL A LINK DELETE

ACCOUNT Active Transport Inc. ≡

Project Price Lists

Price List ↑	
CF_SellingPL-copy	

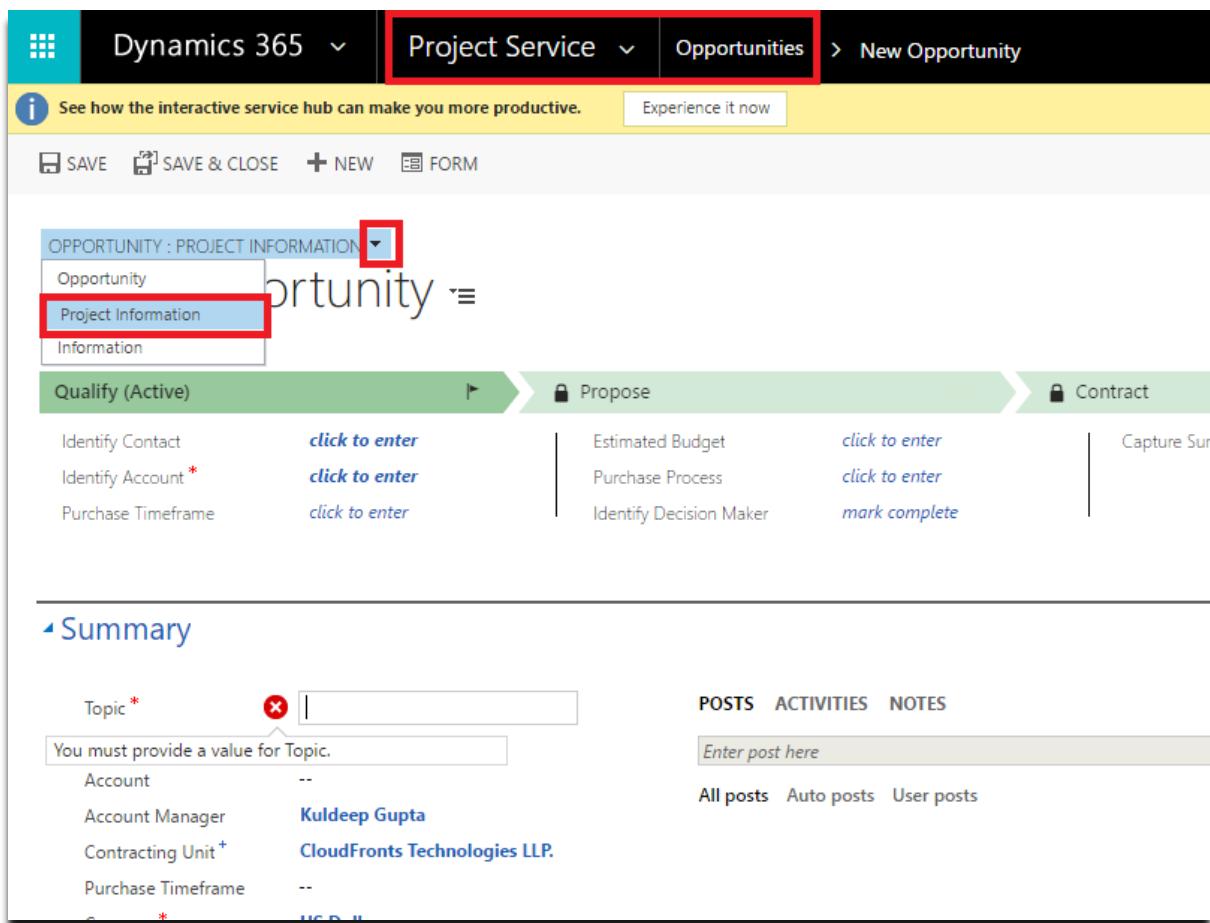
This should always be a Sales Price List. Also, do not forget to Activate the customer once created by hitting the Activate button in the Ribbon control.

Opportunity Management

After we are done with the Basic Setup of the Product. We are now ready to use it. In this part of the e-book, we are going to move towards project creation right from Opportunity Stage → Quotation Stage → Project Contract Stage → closing the Sales Cycle.

Opportunity Stage

The first stage to move towards project creation can probably be creating an opportunity. For creating an opportunity you need to traverse to (Project Services → Opportunity) and create a new opportunity.

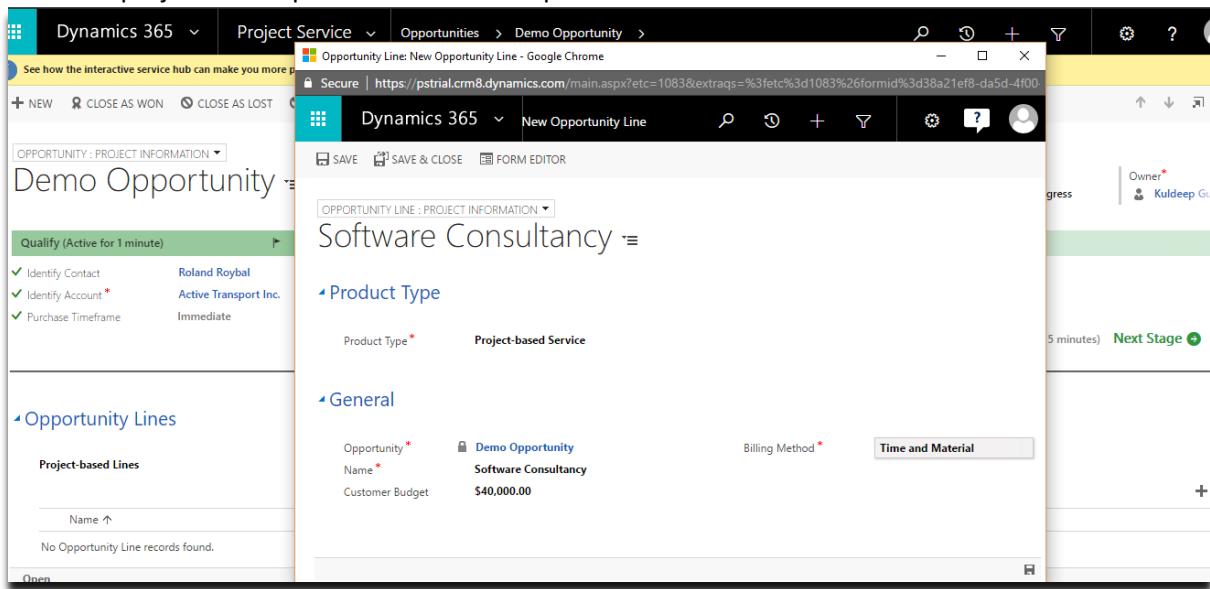


Fill out all the required information. At this point we are in the Qualify stage of the Business Process Flow.

Once you are done, Save the opportunity. Once you save the opportunity you may enter opportunity lines in case you wish to enter.

There are 2 types of Opportunity Lines to enter, **Project Based Lines** and **Product Based Lines**.

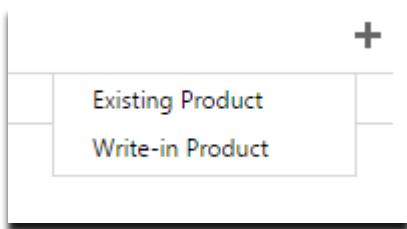
Project Bases Lines are lines that we add for project for instance Software Consultancy or anything related to project development from IT stand point.



The screenshot shows the Dynamics 365 Opportunity Line form. The 'Product Type' is set to 'Project-based Service'. The 'Billing Method' is set to 'Time and Material'. The 'Name' field is populated with 'Software Consultancy'. The 'Opportunity Lines' section is expanded, showing a table with one row: 'Name' (Software Consultancy) and 'Customer Budget' (\$40,000.00). The 'Opportunity' section shows 'Opportunity' (Demo Opportunity) and 'Name' (Software Consultancy). The 'General' section shows 'Opportunity' (Demo Opportunity), 'Name' (Software Consultancy), and 'Customer Budget' (\$40,000.00). The 'Owner' is listed as Kuldeep Gupt.

Product Based Lines are lines that we add for the products that we offer clients. For e.g. D365 Basic License, D365 Enterprise License, Office 365 E3 licenses.

Here we have 2 options when we add Product Based Lines



Existing Product adds the product from the price list that is tagged on the opportunity. Generally, if a customer while creating is tagged with a Price List then, the same price list flows in by default to the opportunity as soon as the customer is selected while creating the opportunity. This can be overridden by selecting a different Price List if needed. This should always be Sales Price List.

Upon selecting the **Existing Product** option, we can select the product from the price list by typing the product name.



The screenshot shows the Dynamics 365 Product Catalog Item search results. The search term is 'Dynamics 365 Team Member'. The results list includes 'Dynamics CRM Basics Licenses in Family' (Standard User), 'Dynamics CRM Enterprise Licenses in Family' (Standard User), 'Dynamics 365 Enterprise Plan 1' (Primary Unit), and 'Dynamics 365 Team Member' (Primary Unit). The 'Look Up More Records' button is visible. The 'Opportunity Sales Process (Active for 1 hour)' and 'Next Stage' are also visible.

Upon selecting the product, we can edit the properties that we defined while creating the product in [Product Catalog Item](#).

Upon selecting the **Write-In Product** option the below form opens. You can fill in the details and add the write-in product to the Product Based Lines Grid.

OPPORTUNITY LINE : PROJECT INFORMATION ▾

Electricity Bill

General

Opportunity*	<input type="button" value="Demo Opportunity"/> Select Product	Write-In	Write-In Product*	Electricity Bill
Existing Product	<input type="button" value="--"/>	Unit	<input type="button" value="--"/>	
Pricing				
Pricing	<input type="button" value="Override Price"/>			
Quantity*	1			
Sales Price *	\$250.00			
Sales Amount	<input type="button" value="--"/>			
Customer Budget	\$250.00			

Once we are done with adding the Project Based and Product Based lines, we can move to the next stage by hitting the Next Stage button on the Business Process Flow.

When you hit the Next Stage Button there are two options that we have:

1. Select an existing Quote
2. Create a new Quote.

At this juncture, we assume we do not have a Quotation in the system and we need to create one.

So, we hit the **Create** + button.

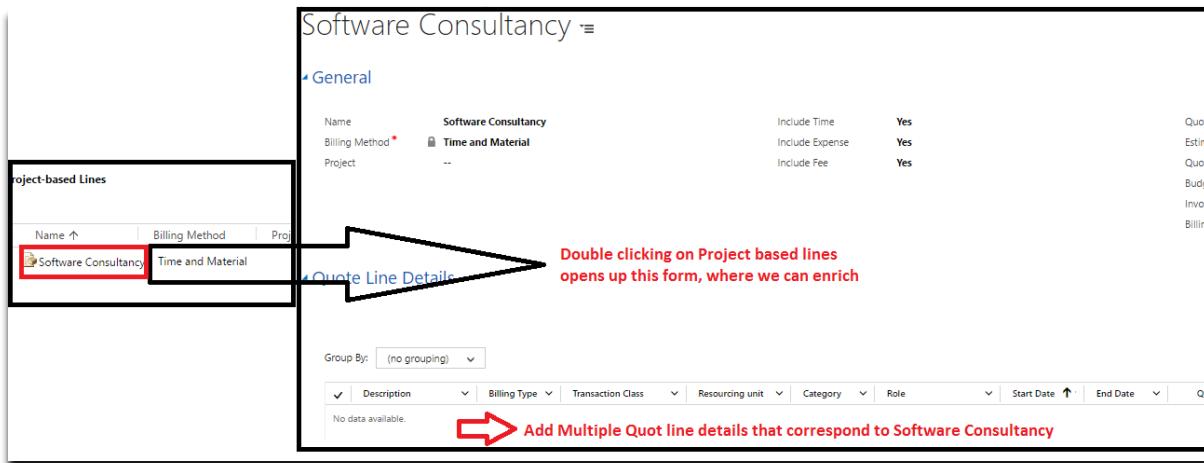
A few changes that takes place on the form are:

1. We move to the next stage of the Business Process Flow, i.e. Propose.
2. We navigated internally to Quote Entity, where the Quote is in Draft state.

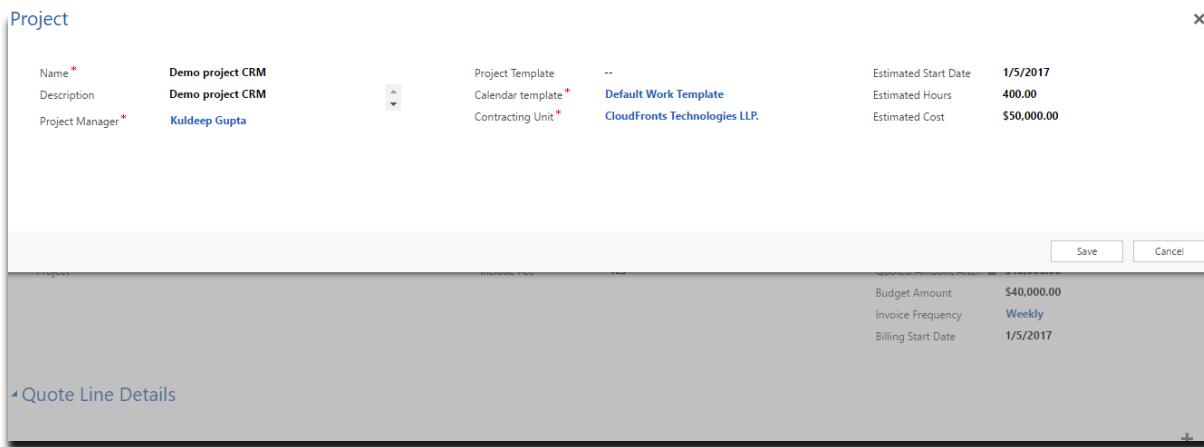
Quote Stage

If we observe here on the Quote form all the details, including the Project Based and Product Based lines are rolled over from Opportunity Phase.

In Quote stage, we need to dig deeper inside each **Project-based Lines** and define them.



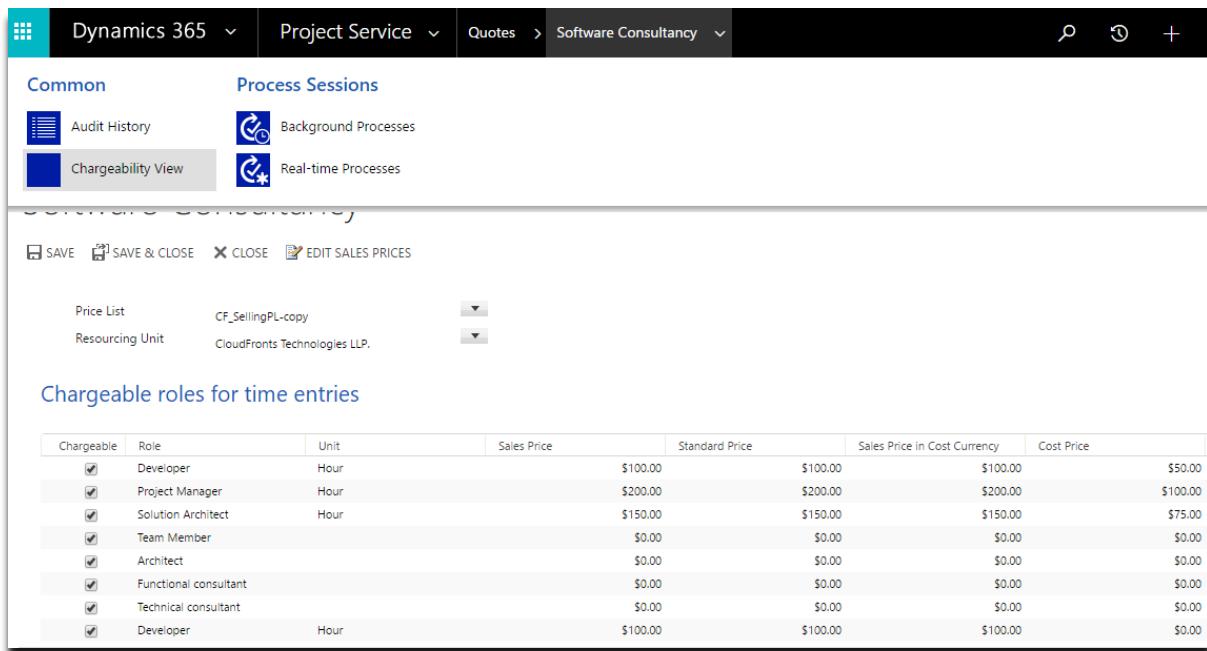
At this juncture, you can also select the project from the lookup or create a new one. For now, we assume we need to create a new project. When we hit on the New button in the look up a Quick Create form opens which asks us the basic details of the project header.



Upon clicking on Save the Project gets created and gets tagged to the Opportunity.

On the Quote form if you wish to check the chargeability View you can click on the **Chargeability View** button from the menu as guided below. This chargeability view tells us the role prices that we are offering to the customer also it tells us the costing per organizational unit. This all comes from the pricelist which is tagged at the opportunity level and the costing comes from the role prices at organizational level.

We also have an option to modify the sales prices here by clicking on the **Edit Sales Price** button.



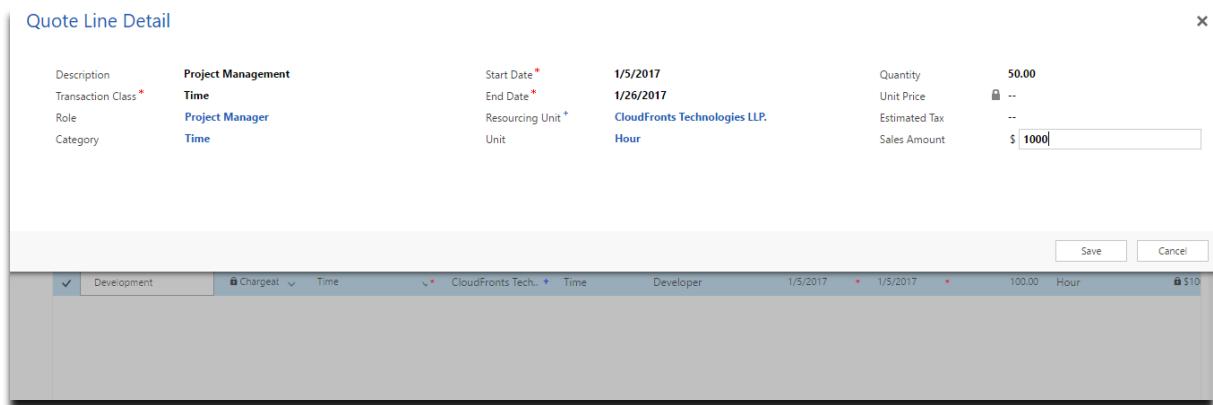
Chargeable roles for time entries

Chargeable	Role	Unit	Sales Price	Standard Price	Sales Price in Cost Currency	Cost Price
<input checked="" type="checkbox"/>	Developer	Hour	\$100.00	\$100.00	\$100.00	\$50.00
<input checked="" type="checkbox"/>	Project Manager	Hour	\$200.00	\$200.00	\$200.00	\$100.00
<input checked="" type="checkbox"/>	Solution Architect	Hour	\$150.00	\$150.00	\$150.00	\$75.00
<input checked="" type="checkbox"/>	Team Member		\$0.00	\$0.00	\$0.00	\$0.00
<input checked="" type="checkbox"/>	Architect		\$0.00	\$0.00	\$0.00	\$0.00
<input checked="" type="checkbox"/>	Functional consultant		\$0.00	\$0.00	\$0.00	\$0.00
<input checked="" type="checkbox"/>	Technical consultant		\$0.00	\$0.00	\$0.00	\$0.00
<input checked="" type="checkbox"/>	Developer	Hour	\$100.00	\$100.00	\$100.00	\$50.00

Coming back to Quote Lines there are 2 options we can add the Quote lines.

1. Add the lines manually:

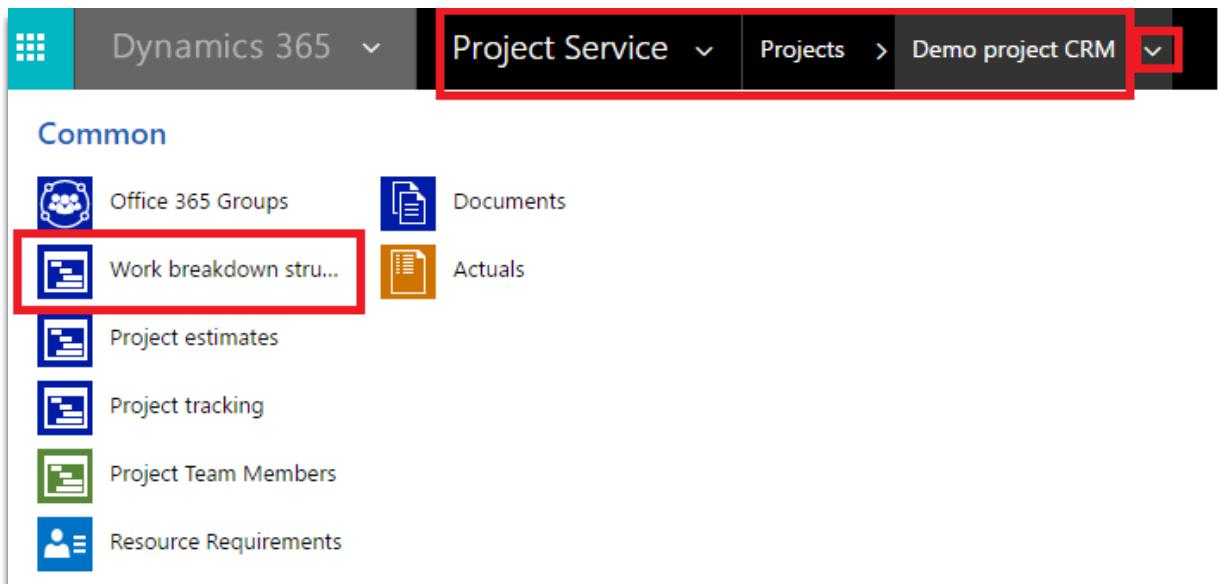
Here we click on the plus icon over the grid and Quick Create form for Quote Line Detail opens. We can fill in the required details for the Quote line and save that line. Upon saving that line appears in the Quote Line grid.



Description	Project Management	Start Date*	1/5/2017	Quantity	50.00
Transaction Class*	Time	End Date*	1/26/2017	Unit Price	..
Role	Project Manager	Resourcing Unit*	CloudFronts Technologies LLP.	Estimated Tax	..
Category	Time	Unit	Hour	Sales Amount	\$ 1000

2. Import them from Project Lines:

Here we have a facility to import all the lines from Project's WBS (Work Breakdown Structure). To create the lines in WBS, you can navigate to Project Services→Projects→open the project→ Work Breakdown Structure.

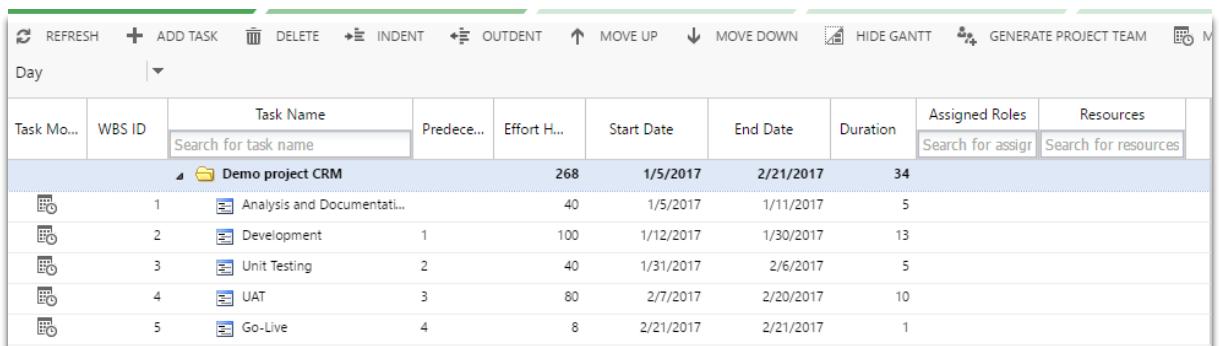


Dynamics 365 > Project Service > Projects > Demo project CRM

Common

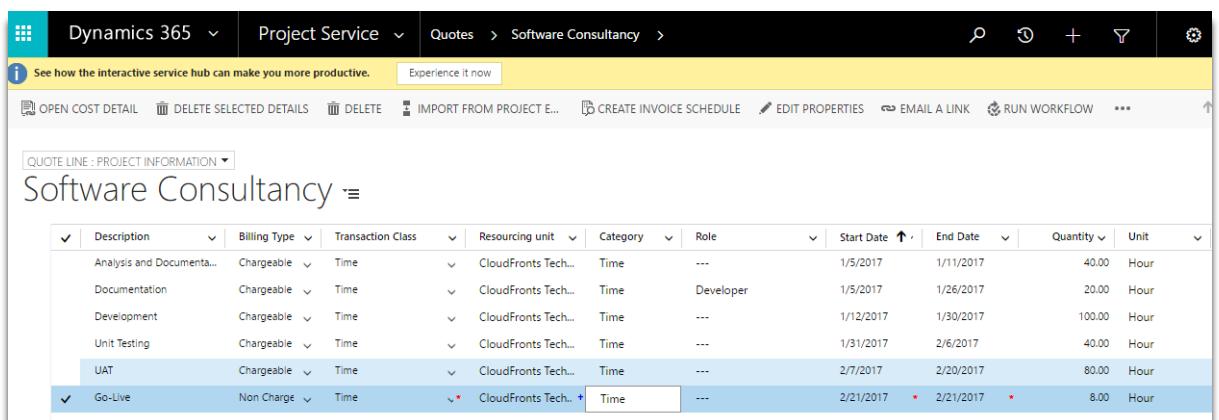
- Office 365 Groups
- Documents
- Work breakdown stru...**
- Project estimates
- Project tracking
- Project Team Members
- Resource Requirements

Work breakdown structure is where you plan your project, add tasks and do other activities with it which we shall see later in this document. Below is how WBS looks after adding a couple of tasks.



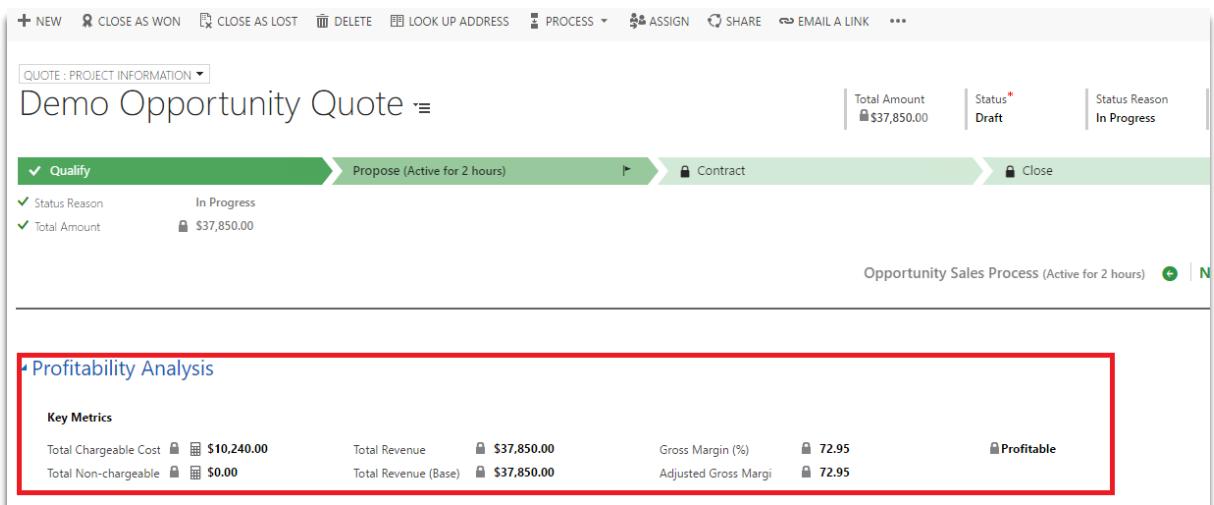
Task Mo...	WBS ID	Task Name	Predece...	Effort H...	Start Date	End Date	Duration	Assigned Roles	Resources
		Demo project CRM		268	1/5/2017	2/21/2017	34		
	1	Analysis and Documentati...		40	1/5/2017	1/11/2017	5		
	2	Development	1	100	1/12/2017	1/30/2017	13		
	3	Unit Testing	2	40	1/31/2017	2/6/2017	5		
	4	UAT	3	80	2/7/2017	2/20/2017	10		
	5	Go-Live	4	8	2/21/2017	2/21/2017	1		

Once this is ready, we can hit on “Import from Project Estimation” button on the ribbon control. This will bring in all the line details from the project in Quote Line Details.



✓	Description	Billing Type	Transaction Class	Resourcing unit	Category	Role	Start Date	End Date	Quantity	Unit
✓	Analysis and Documenta...	Chargeable	Time	CloudFronts Tech...	Time	...	1/5/2017	1/11/2017	40.00	Hour
	Documentation	Chargeable	Time	CloudFronts Tech...	Time	Developer	1/5/2017	1/26/2017	20.00	Hour
	Development	Chargeable	Time	CloudFronts Tech...	Time	...	1/12/2017	1/30/2017	100.00	Hour
	Unit Testing	Chargeable	Time	CloudFronts Tech...	Time	...	1/31/2017	2/6/2017	40.00	Hour
	UAT	Chargeable	Time	CloudFronts Tech...	Time	...	2/7/2017	2/20/2017	80.00	Hour
✓	Go-Live	Non Charge	Time	CloudFronts Tech...	Time	...	2/21/2017	2/21/2017	8.00	Hour

On the Quote form, we can Check the Profitability of the project by visiting the **Profitability Analysis Section** on the quote.



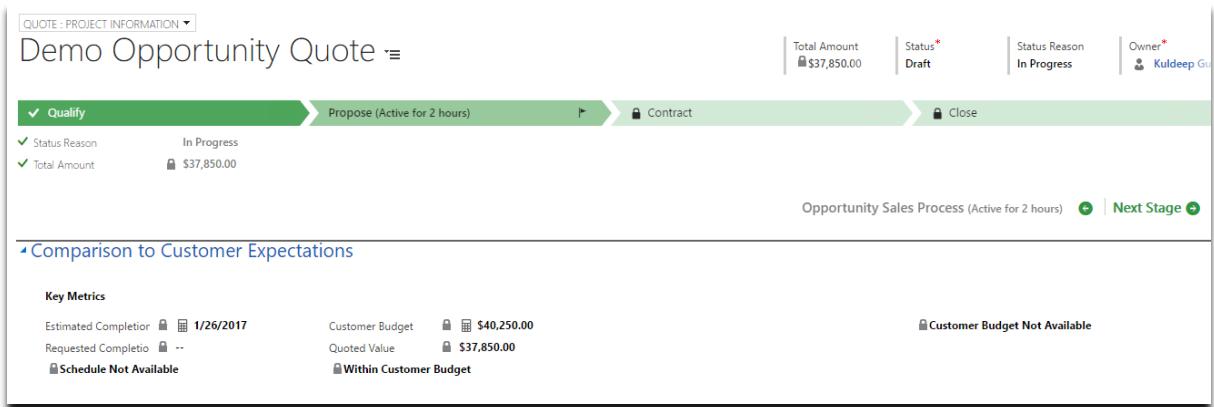
Opportunity Sales Process (Active for 2 hours) (1) | N

Profitability Analysis

Key Metrics

Total Chargeable Cost (1) \$10,240.00	Total Revenue (1) \$37,850.00	Gross Margin (%) (1) 72.95	Profitable
Total Non-chargeable (1) \$0.00	Total Revenue (Base) (1) \$37,850.00	Adjusted Gross Margin (1) 72.95	

We also can do a Comparison to Customer Expectations



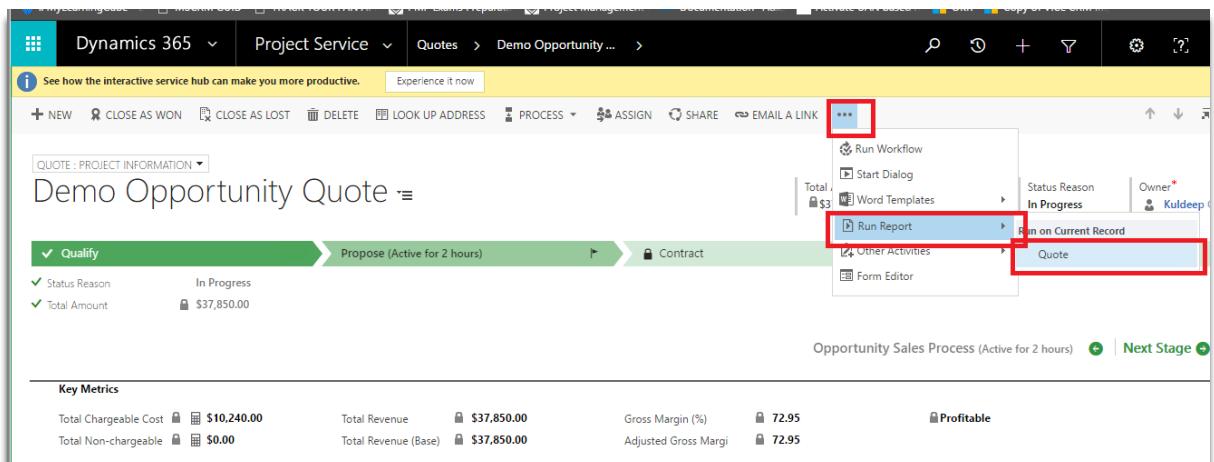
Opportunity Sales Process (Active for 2 hours) (1) | N

Comparison to Customer Expectations

Key Metrics

Estimated Completion (1) 1/26/2017	Customer Budget (1) \$40,250.00	Customer Budget Not Available
Requested Completion (1) --	Quoted Value (1) \$37,850.00	
Schedule Not Available	Within Customer Budget	

Once we are done with the Quotation we have a nice report that we can extract and send out to the customers. This can also be customized as per personal need.



Opportunity Sales Process (Active for 2 hours) (1) | N

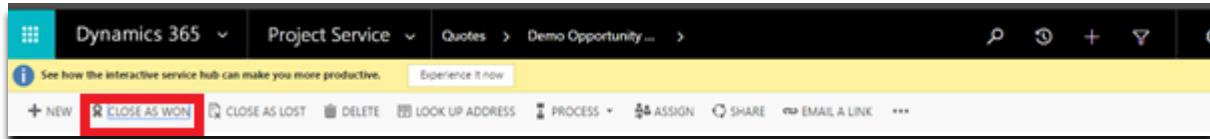
Run Report

Run on Current Record

Quote

Contract Stage

Once the quote is accepted by the Customer the next stage to create a contract of the deal. For this we need to mark the Quotation “CLOSE AS WON”. Upon doing this it automatically creates the contract of the quote.



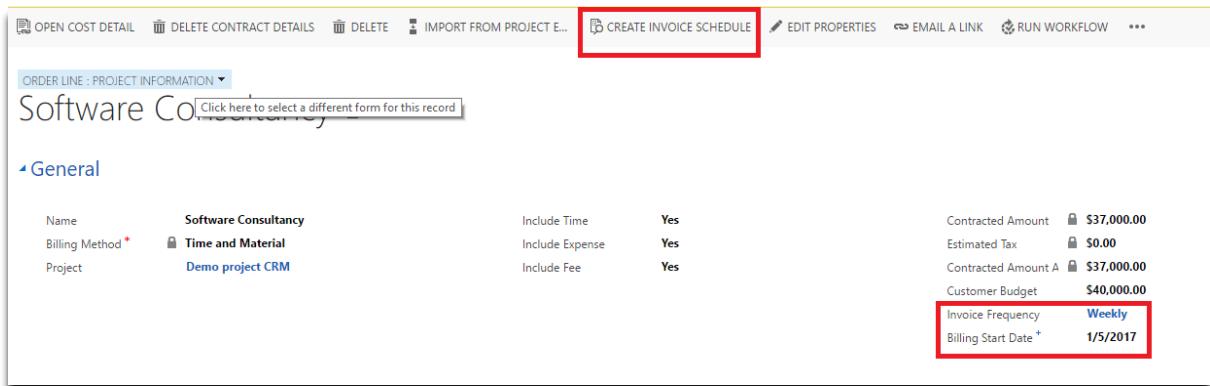
After the contract is created, for each Project Based Contract lines we can generate the Invoicing schedule.

There are 2 types of Invoicing Schedule that can be generated:

1. Billing Frequency Based

This gets generated for Project Contract Lines which possess Billing Method as “Time and Material”.

To generate the billing frequency, click on the button “CREATE INVOICE SCHEDULE” on the ribbon control.



Once done, you can see the Schedule defined as per below:

ORDER LINE : PROJECT INFORMATION ▾

Software Consultancy ≡

▲ Invoice Schedule

Invoice Run Date ↑	Transaction Cut Off Date	Milestone status	Invoice
1/11/2017	1/10/2017	Not Run	
1/18/2017	1/17/2017	Not Run	
1/25/2017	1/24/2017	Not Run	
2/1/2017	1/31/2017	Not Run	
2/8/2017	2/7/2017	Not Run	
2/15/2017	2/14/2017	Not Run	
2/22/2017	2/21/2017	Not Run	
3/1/2017	2/28/2017	Not Run	
3/8/2017	3/7/2017	Not Run	
3/15/2017	3/14/2017	Not Run	

2. Milestone Based

This gets generated for Project Contract Lines which possess Billing Method as “Fixed Price”.

To generate the billing frequency, click on the button “GENERATE PERIODIC MILESTONE” on the ribbon control.

ORDER LINE : PROJECT INFORMATION ▾

Expenses ▾

▪ Invoice Schedule

Milestone Name ↑	Project Task	Milestone Date	Milestone Amount	Invoice Status
1/11/2017		1/11/2017	\$166.67	Not Ready for invoicing
1/18/2017		1/18/2017	\$166.67	Not Ready for invoicing
1/25/2017		1/25/2017	\$166.67	Not Ready for invoicing
2/1/2017		2/1/2017	\$166.67	Not Ready for invoicing
2/15/2017		2/15/2017	\$166.67	Not Ready for invoicing
2/22/2017		2/22/2017	\$166.67	Not Ready for invoicing
2/8/2017		2/8/2017	\$166.67	Not Ready for invoicing
3/1/2017		3/1/2017	\$166.67	Not Ready for invoicing
3/15/2017		3/15/2017	\$166.67	Not Ready for invoicing

After the contract is confirmed the Contract can then be closed. This ends the opportunity management life cycle.

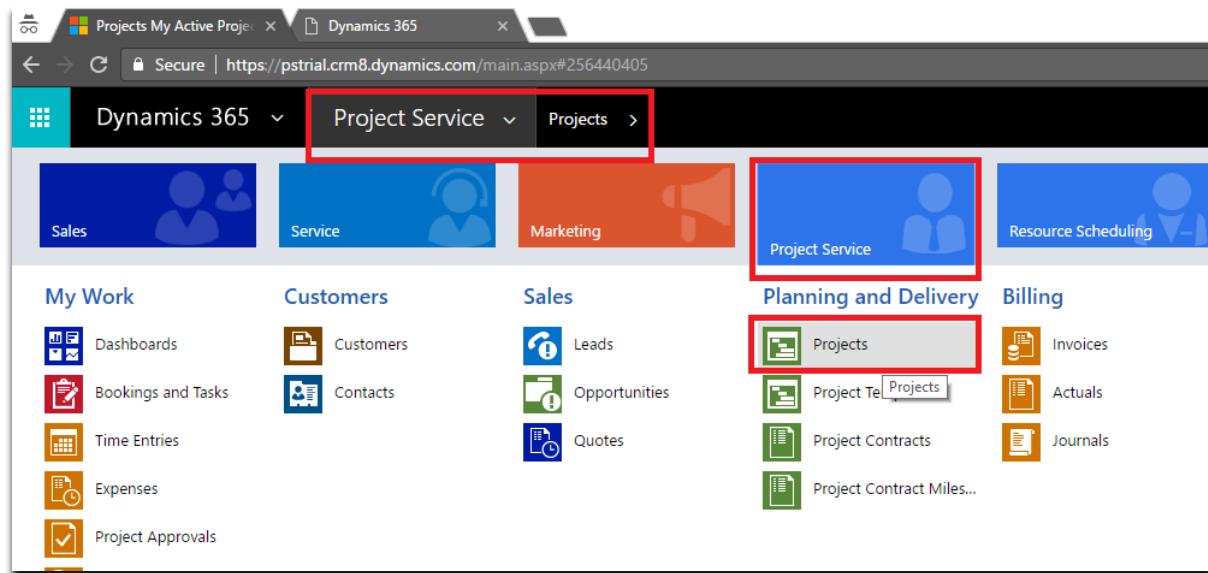
Planning with MS – PSA

We saw the entire sales cycle in Part 2 of this e-book. In this part, we are going to have a look at how to plan the project and how it integrates with MS Project.

Once the contract is confirmed and accepted by the client, the project manager now jumps in the actual mode of planning the project, creating his team.

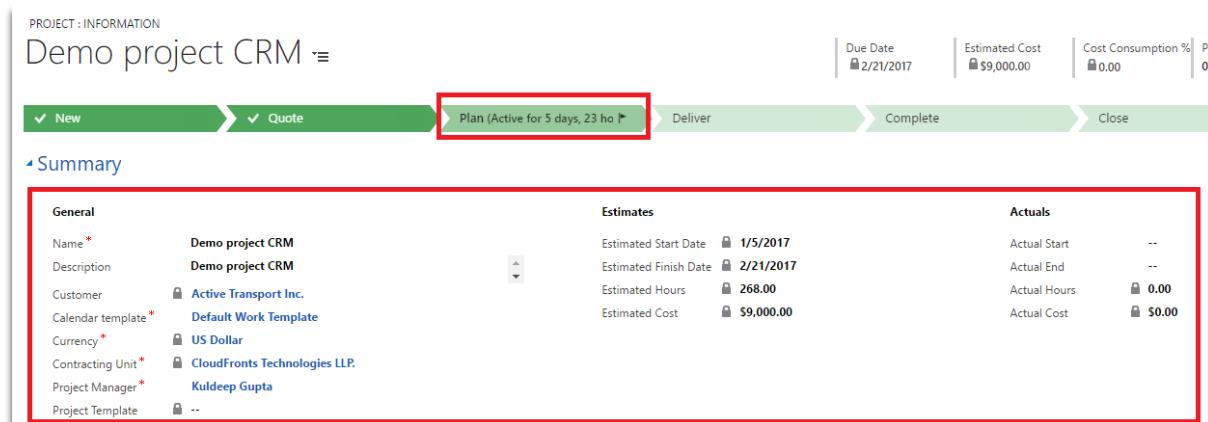
With planning, he can also estimate his work effectively and make appropriate resource arrangements well in advance.

To plan the project Manager goes in Project Services→Projects

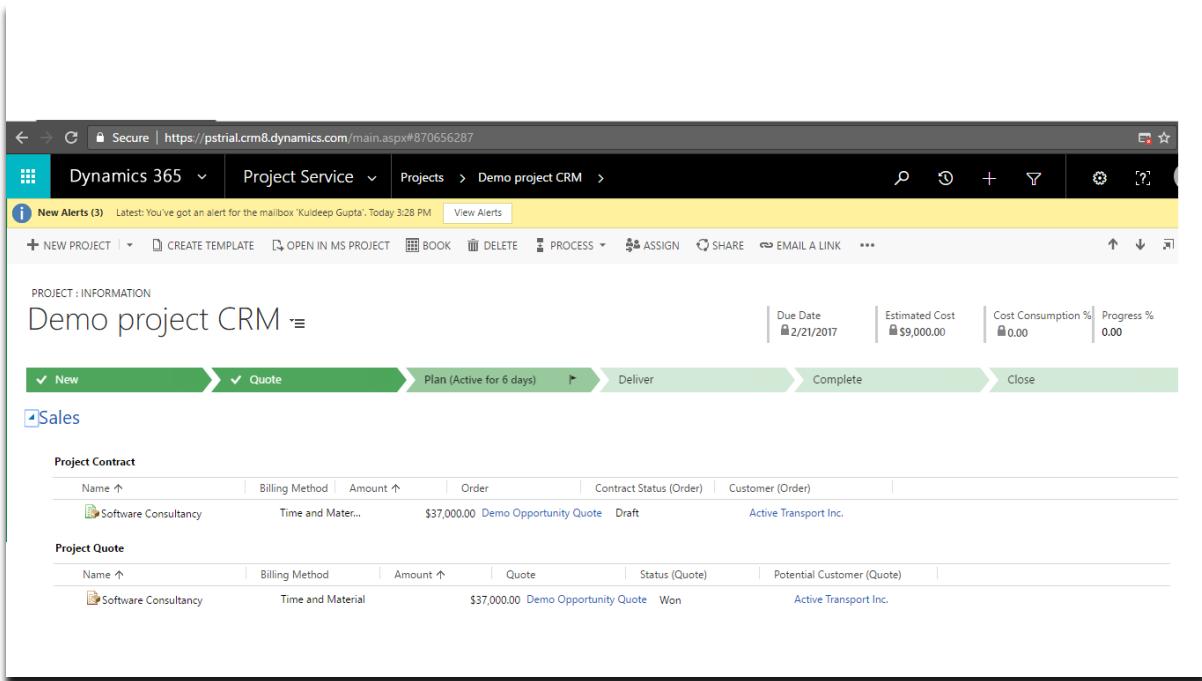


Select the project that you had created while creating the Quotation (Explained in Part 2, Opportunity Management).

When we open the project, we see that we are already in the Planning stage of the business process flow. Along with which we can also see the header details of the project that we created.



We also see below is the Sales Section where can see the Project contract, Project Quote and Project Opportunity getting tagged on the Project.

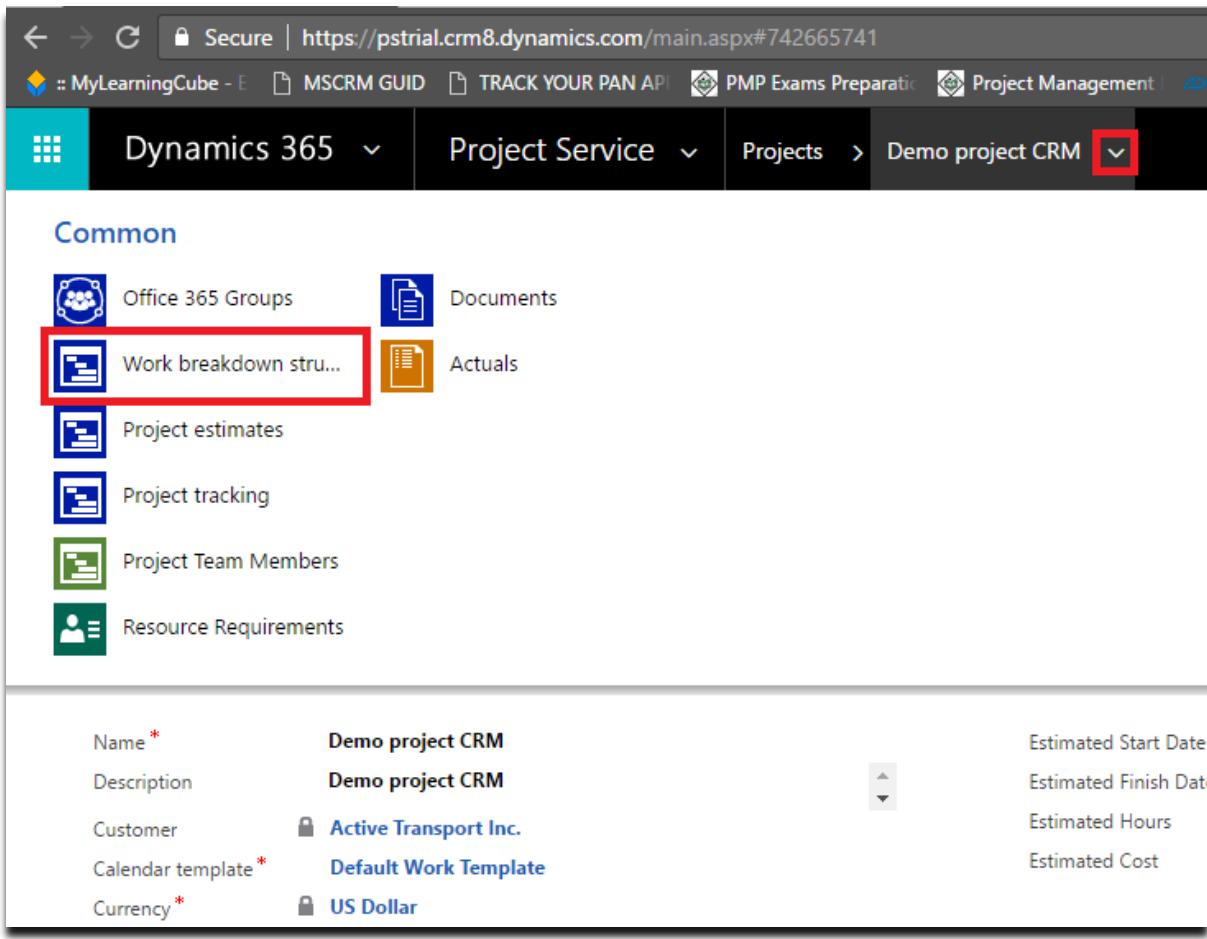


The screenshot shows the Dynamics 365 Project Service interface for a project named 'Demo project CRM'. The 'Sales' section is selected. At the top, there are buttons for 'New', 'Quote', 'Plan (Active for 6 days)', 'Deliver', 'Complete', and 'Close'. Below this, there are two tables: 'Project Contract' and 'Project Quote'. The 'Project Contract' table shows one entry for 'Software Consultancy' with a due date of 2/21/2017, estimated cost of \$9,000.00, and 0.00 cost consumption. The 'Project Quote' table shows one entry for 'Software Consultancy' with a status of 'Won'.

Work Break Down structure

Work Break Down Structure or WBS is a place where a project manager can prepare the schedule of the project, prepare a proper plot of the project, allocate resource. WBS describes the work to be done on a project. If the WBS is planned properly, the chances of project gaining success improves drastically. This is the only place where we also describe which tasks is to be performed after which task.

To create a WBS you can go to Project Services→Project→Work Breakdown structure.



The screenshot shows the Dynamics 365 Project Service interface. The top navigation bar includes links for 'MyLearningCube', 'MSCRM GUID', 'TRACK YOUR PAN API', 'PMP Exams Preparation', 'Project Management', and 'Project Service'. Below the navigation is a breadcrumb trail: 'Dynamics 365 > Project Service > Projects > Demo project CRM'. The main content area is titled 'Common' and contains several options: 'Office 365 Groups', 'Documents', 'Work breakdown stru...', 'Actuals', 'Project estimates', 'Project tracking', 'Project Team Members', and 'Resource Requirements'. The 'Work breakdown stru...' option is highlighted with a red box. Below this is a table with project details:

Name *	Demo project CRM	Estimated Start Date
Description	Demo project CRM	Estimated Finish Date
Customer	Active Transport Inc.	Estimated Hours
Calendar template *	Default Work Template	Estimated Cost
Currency *	US Dollar	

Below are the tasks that we can perform on the WBS.

1. Add Task.
2. Indent the task (Make the task a child task to another task)
3. Outdent the task (Make a child task the main task of its parent task)
4. Move Tasks Up and Down
5. Delete a Task
6. Hide Gantt Chart
7. Move Project
8. Choose Columns
9. Generate Project Team

Add Task

When you start creating the Gantt Chart, it is empty with no task. You can start adding the tasks on the Gantt Chart by hitting on the **+ ADD TASK** Button.

The Added task has lot of attributes that plays high importance to Project Manager while planning, like:

Task Name

This is basically the name of the task.

Precedence

This defines which task shall be performed after which task.

Effort Hours

They define the no of hours that task is for.

Start Date

This tells you when the task is supposed to start.

End Date

This tells you when the task is supposed to end.

Duration

This provided the duration of tasks in Days.

Assigned Roles

This defines the type of role needed for that task.

Resources

This will tell you which resource is working on that task.

Indent the task

This will make the Task a child task to the task before it.

Outdent the Task

This will make the child task the main task of its parent task.

Move Up and Move Down

With this we can move the order of the task up and down.

Delete

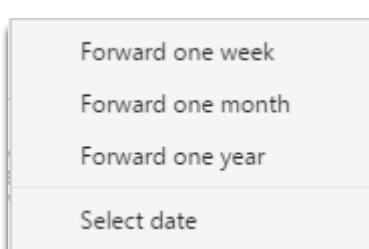
Delete will delete the task from WBS.

Hide Gantt Chart

This will Hide the Gantt Chart on the Right-Hand Side of the WBS.

Move Project

This provides you with an option to move the project by the following 4 options:



Forward one week

Move the entire plan ahead by a week.

Forward one month

Move the entire plan ahead by a month.

Forward one year

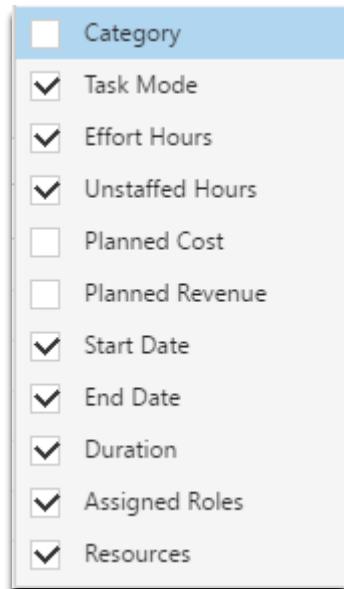
Move the entire plan ahead by a year.

Select a date

Move the entire plan ahead or before, by a specific date.

Choose Columns

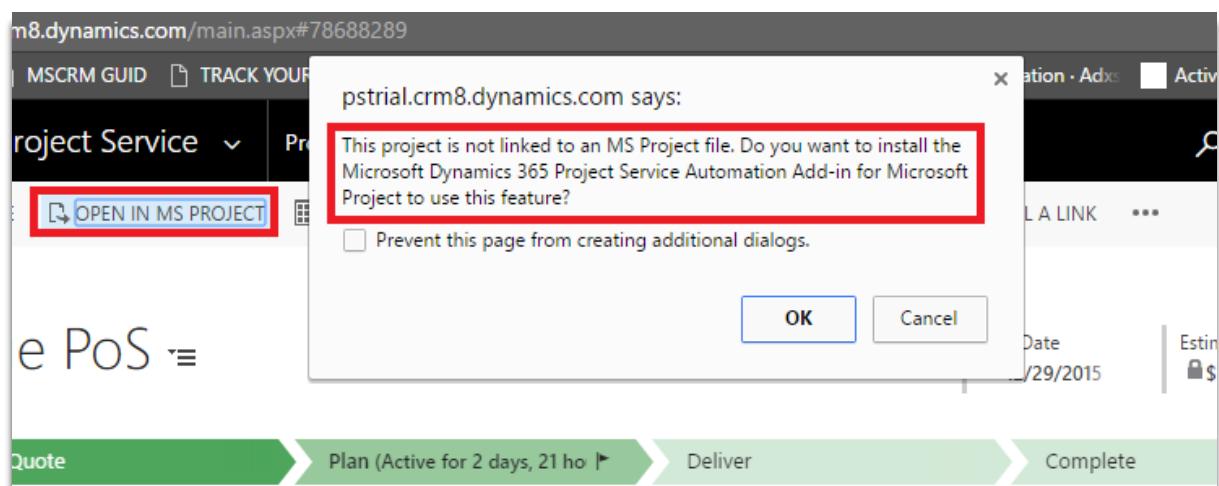
Choose columns provide us with the columns that we wish to, or do not wish to see on the WBS.



Planning with MS Project

Dynamics 365 MS Project allows Project Manager to plan more efficiently by allowing them to plan in MS Project. Following is the way how you can use MS Project to plan your project.

Open the project from Project Services → Projects → "Project Name", click on "OPEN IN MS PROJECT" button in Ribbon Control. I will give you a message that the project is not linked to



As soon as we hit "OK" on the message box, it redirects us to the page where we need to download the Microsoft Dynamics 365 Project Service Automation Add-in for Microsoft Project.

Select your language and hit on “Download” button.

Microsoft Dynamics 365 Project Service Automation Add-in for Microsoft Project

Select Language:

English

Download

Select whether you need the 64 bit or 32 bit version and click “Next”.

Choose the download you want

File Name	Size
<input checked="" type="checkbox"/> Microsoft Dynamics 365 Project Service Automation Add-in for Microsoft Project x64.msi	3.8 MB
<input type="checkbox"/> Microsoft Dynamics 365 Project Service Automation Add-in for Microsoft Project x86.msi	3.8 MB

Download Summary:

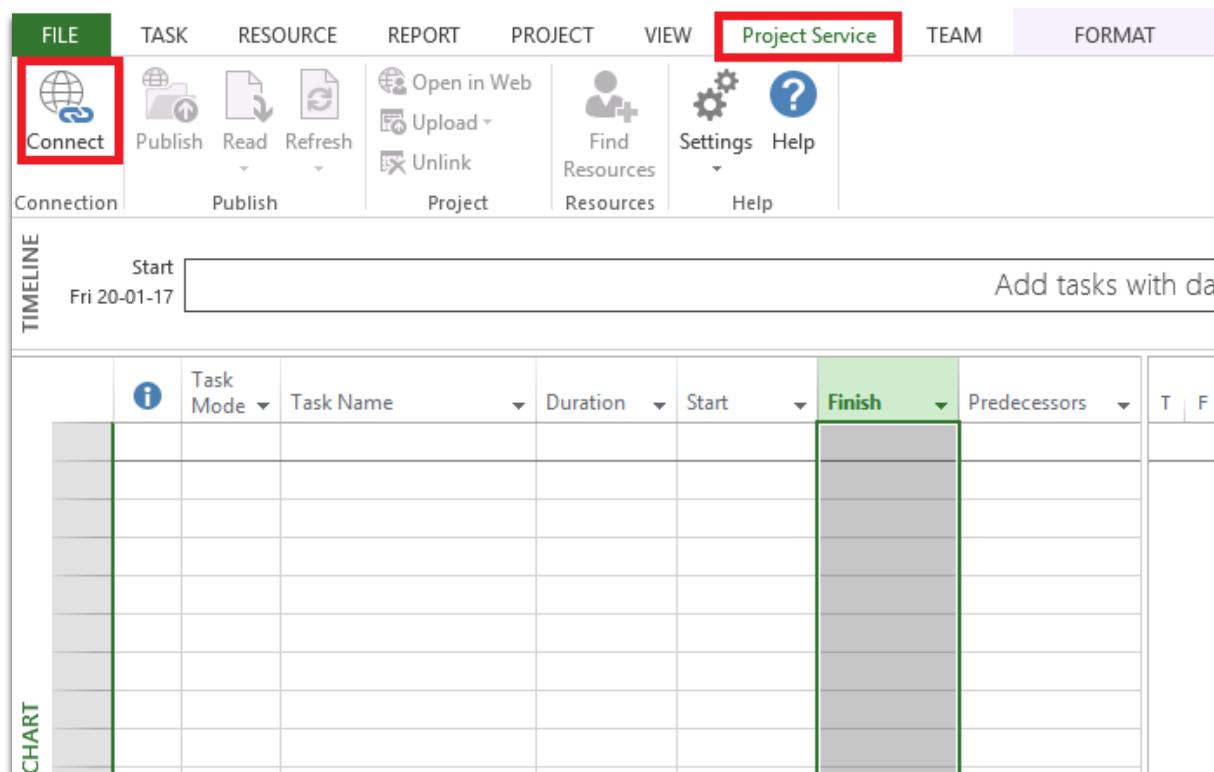
1. Microsoft Dynamics 365 Project Service Automation Add-in for Microsoft Project x64.msi

Total Size: 3.8 MB

Next

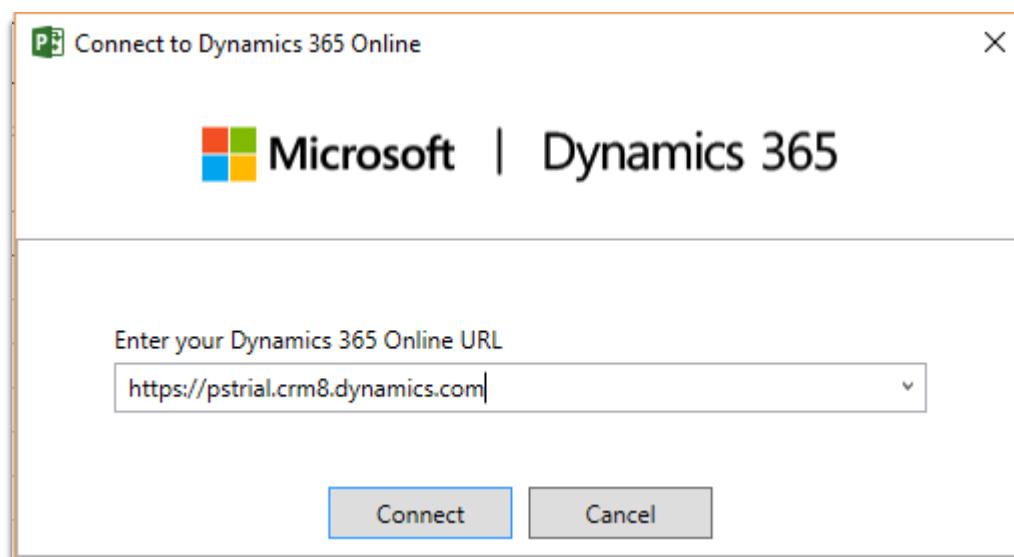
This will download “Microsoft Dynamics 365 Project Service Automation Add-in for Microsoft Project x64.msi” file on your system. Save the file and install it.

After the installation of Add-in is complete then open MS Project application and click on “Project Service” tab and click on “Connect” Button

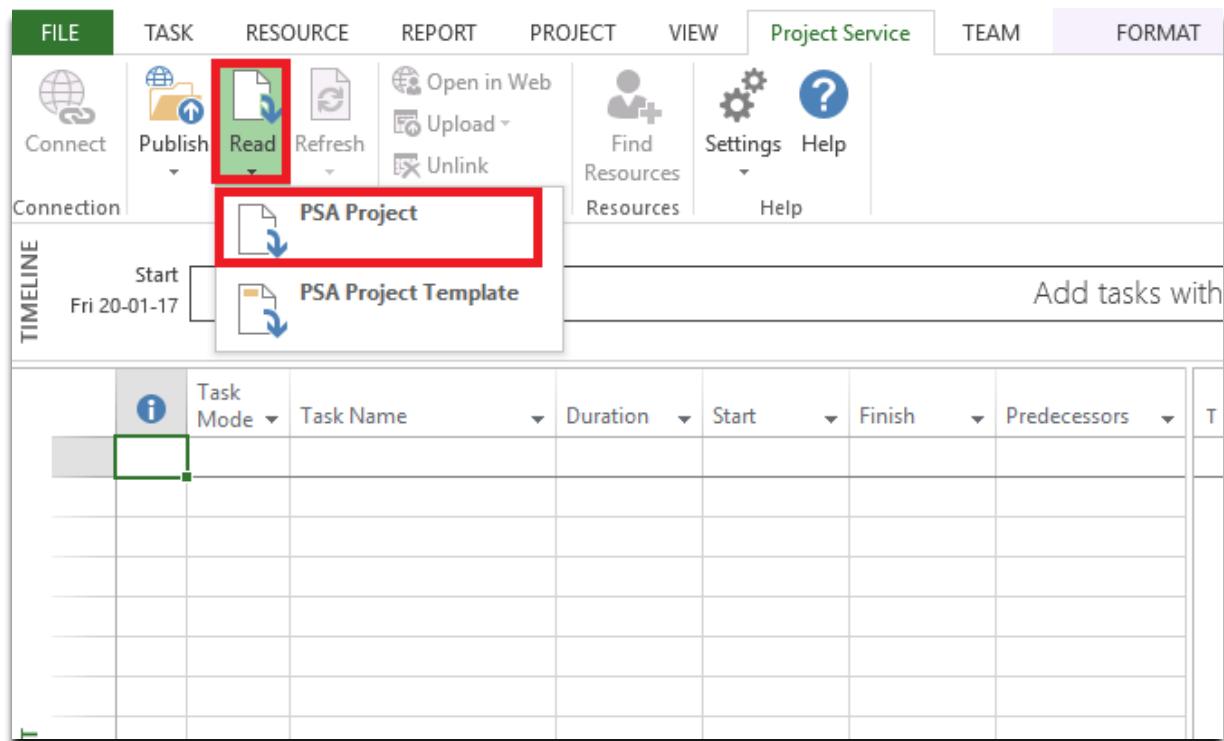


The screenshot shows the Microsoft Project ribbon with the 'Project Service' tab selected. The 'FILE' tab is also highlighted with a red box, and the 'Connect' button is visible within it. The 'Timeline' and 'Chart' tabs are on the left side of the interface.

This will open a pop-up, where you will need to enter the D365 environment URL and click "Connect"

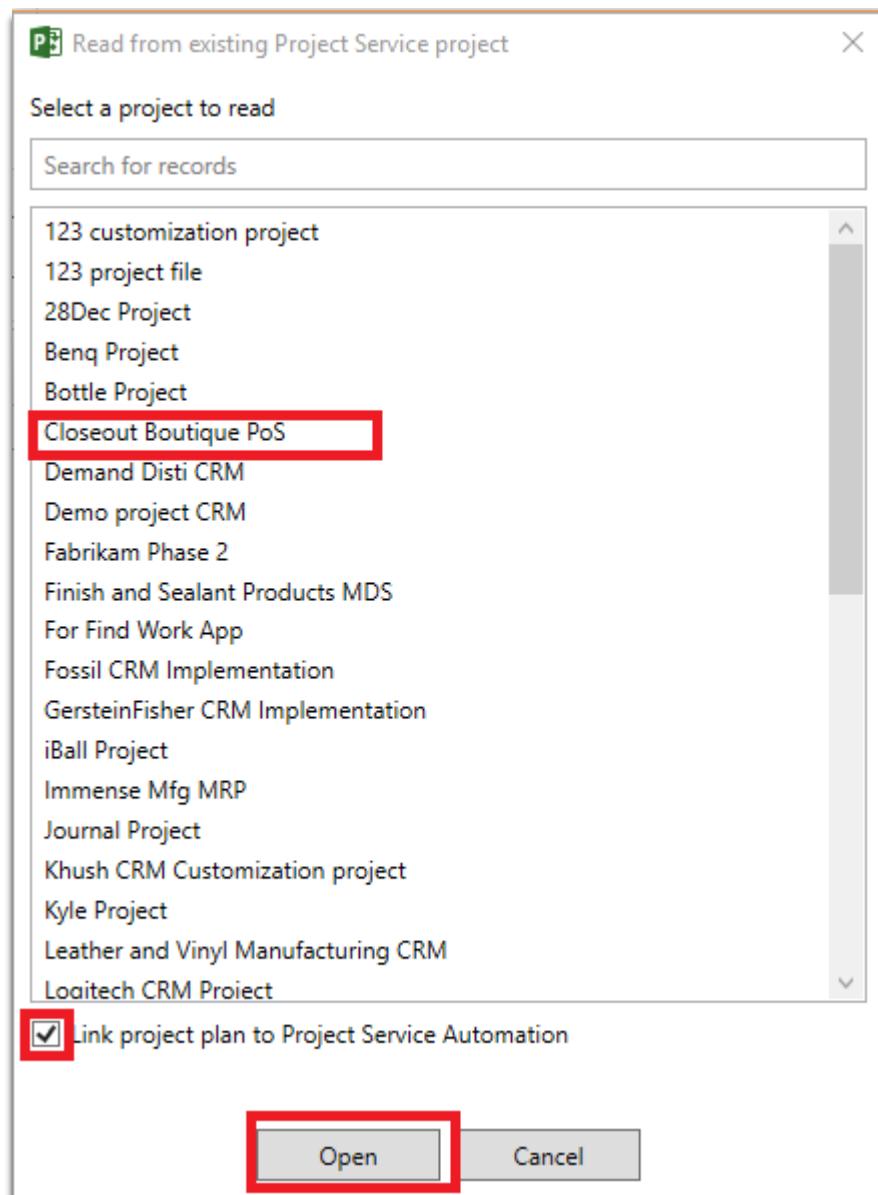


This will ask you for the credentials for the D365 Environment, enter the sign in details and login. After successful login, click on "Read" button.

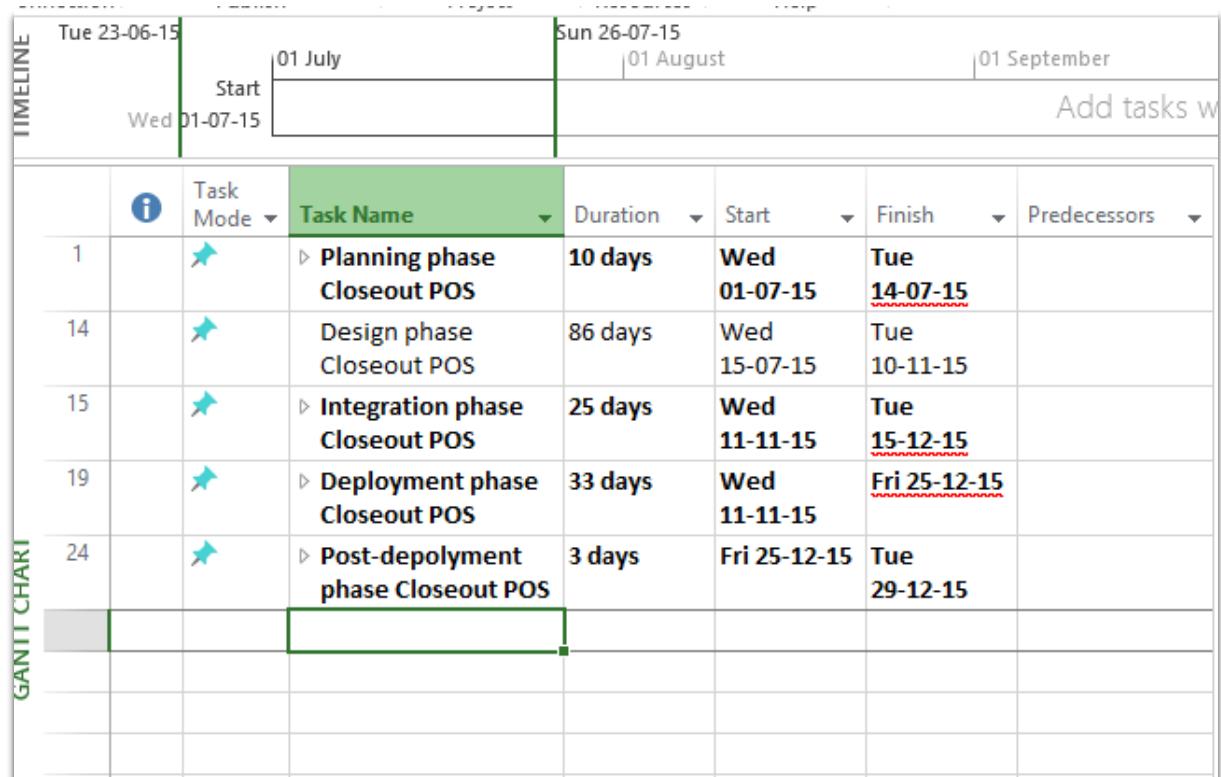


The screenshot shows the Project Service ribbon in Dynamics 365. The 'TASK' tab is selected, and the 'Read' button is highlighted with a green box. A dropdown menu is open, showing 'PSA Project' and 'PSA Project Template' with a red box around 'PSA Project'. The timeline shows a task starting on Friday, January 20, 2017.

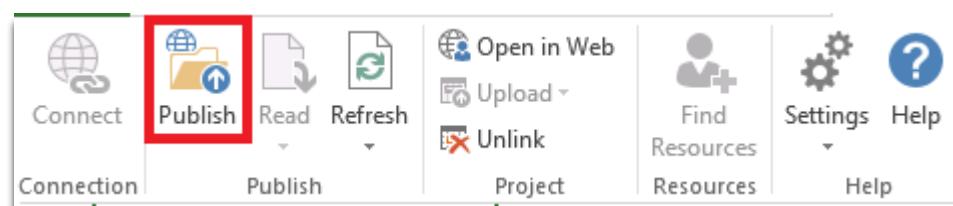
This will ask you to select the project to be edited.



All the tasks from PSA WBS flows in the MS Project.



After you are done with your editing, you can click on “Publish” button to publish the details on the MS PSA.

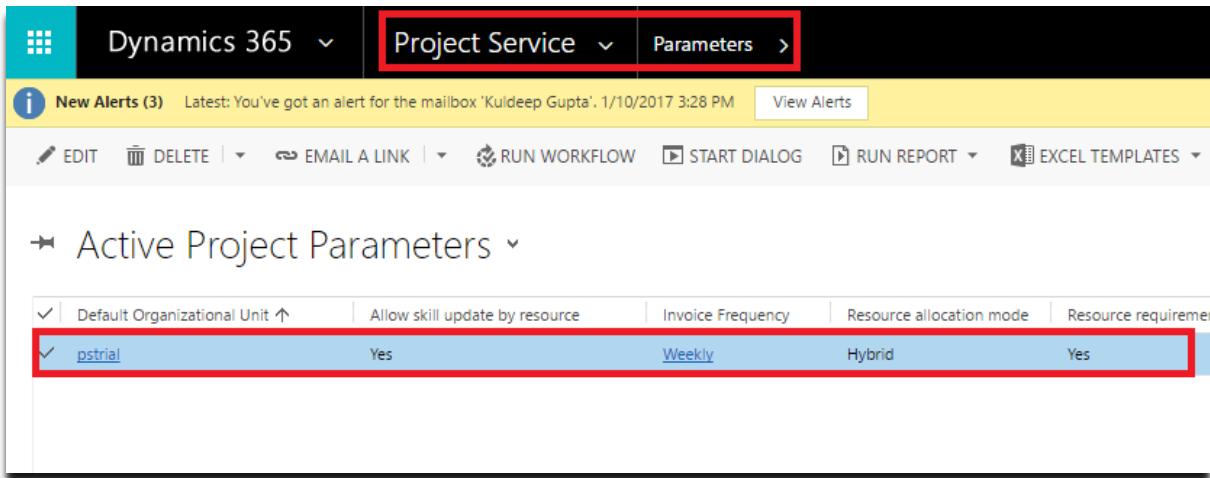


Here on, if you now click on “OPEN IN MS PROJECT” button from your project, it will open MS Project.

Who all can allocate resources?

PSA allows us to decide who all can do the resource allocation to the projects. To configure the same, we need to do an additional parameter setting in Project Services → Parameters.

Select the Parameter setting or create a new one.



Default Organizational Unit ↑	Allow skill update by resource	Invoice Frequency	Resource allocation mode	Resource requirement mode
<input checked="" type="checkbox"/> pstrial	Yes	Weekly	Hybrid	Yes

In the General Section, we need to mainly configure the below:

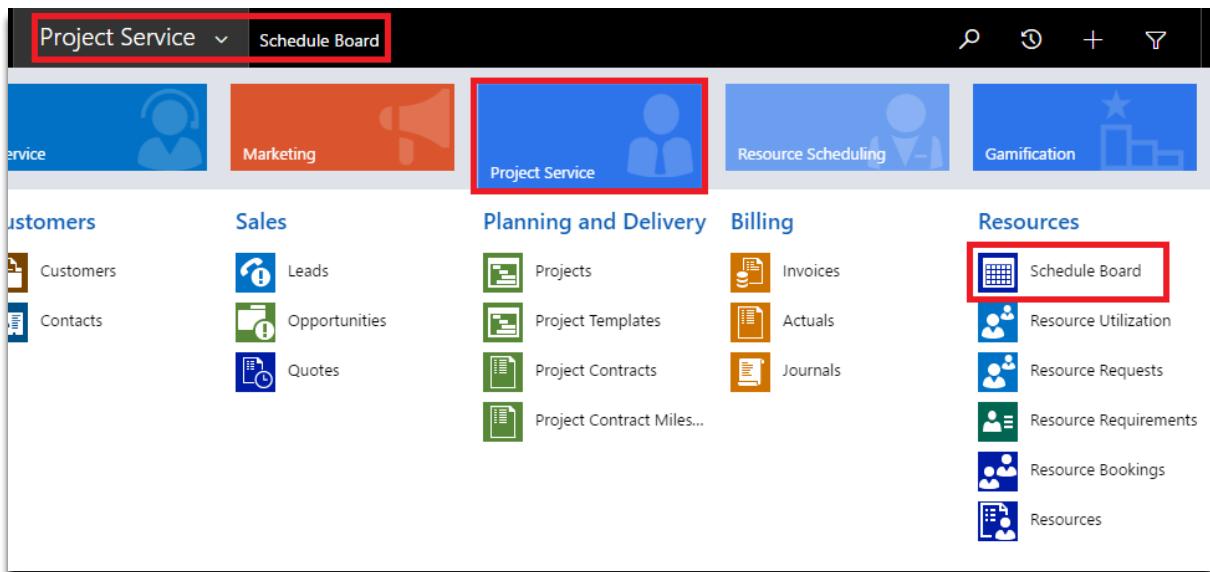
1. Invoice Frequency
2. Project Manager Role
3. Team Member Role
4. Resource Allocation
 - a. Central
 - i. Only Resource Managers can allocate the resources to the project
 - b. Hybrid
 - i. Here Project Managers, Account Managers and Resource Managers can allocate resources to the project.

Resource Scheduling

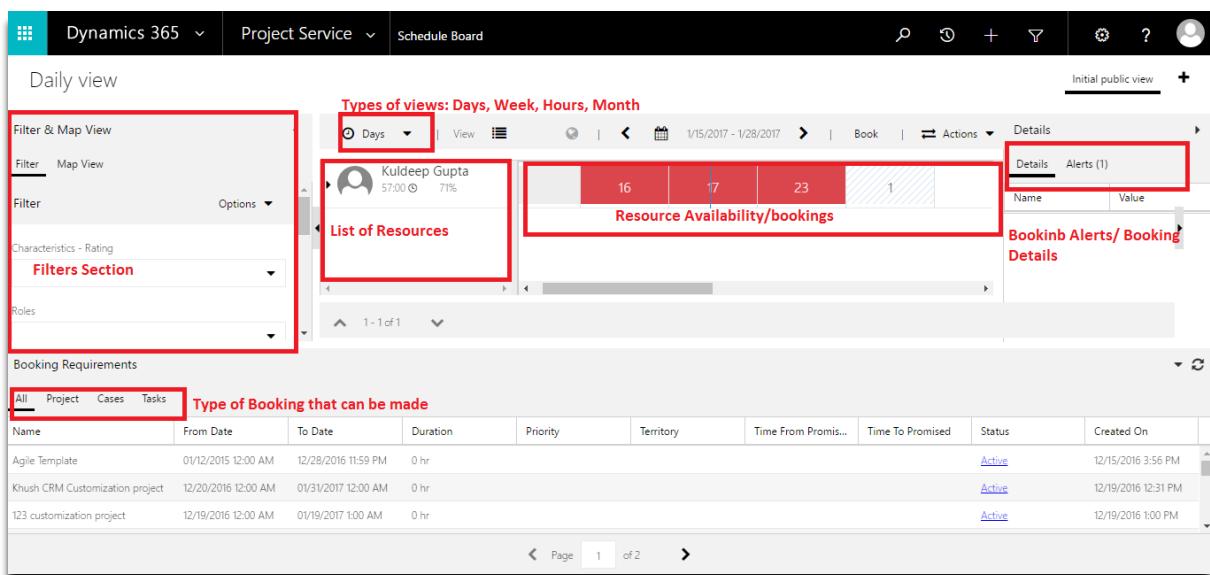
What is a Schedule board?

Schedule board gives you an overall view of your resources and their bookings. It tells us how much is the resource booked. You can view the availability by Month, Week, Day or Hours.

To navigate to Schedule board, you can go to Project Services → Schedule Board

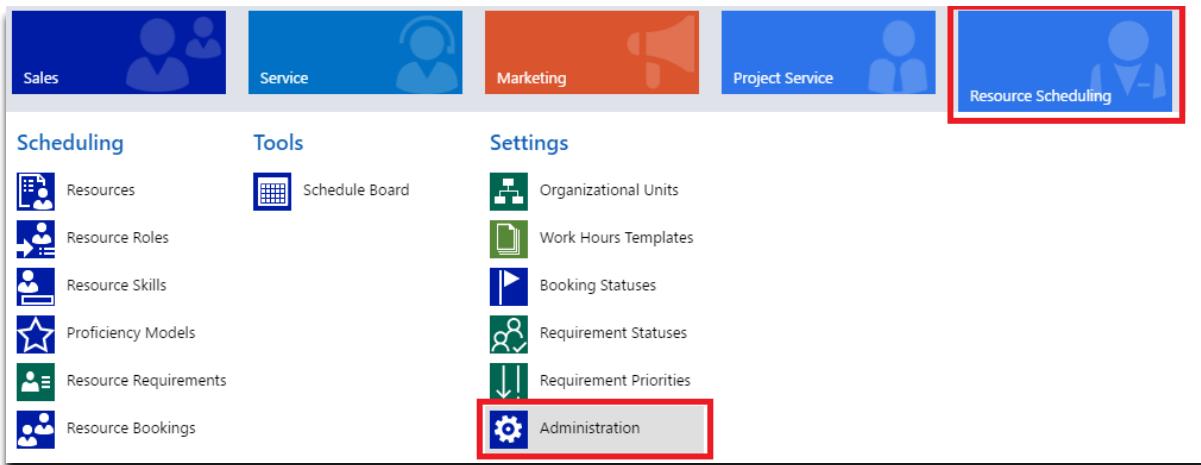


Upon opening the schedule board looks like below:

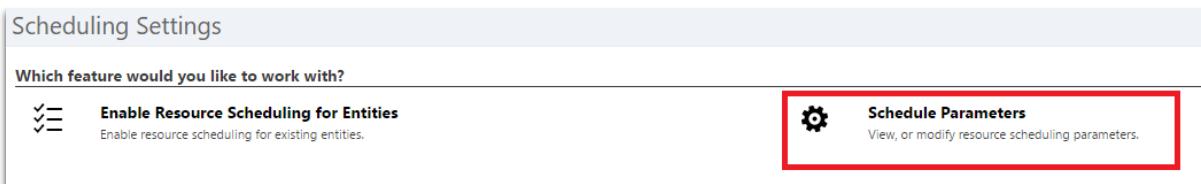


Configuring a schedule board

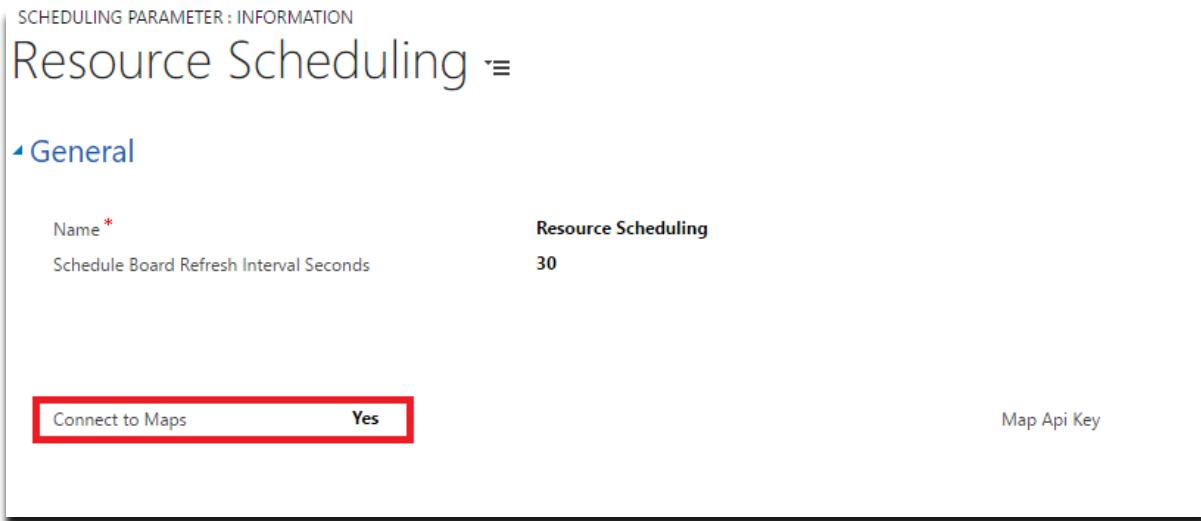
Before we go to the schedule board we need to configure the same. For configuring the Schedule board navigate to Resource Scheduling→Administration.



Click on Schedule Parameters



Mark “Connect to Maps” as Yes.



Schedule a resource

After we have configured the resource now we can Book the resource from Schedule board. For the same, navigate to Schedule board as shown above.

Filter & Select the resource you want to schedule.

Filter & Map View

Filter Map View

Roles

Project Manager X

Territories

Organizational Units

ptrial X

Resource Types

Account X Contact X Equipment X

User X

Teams

Kuldeep

 Kuldeep Gupta
24:00 ⓘ 30%

Select the dates you want to allocate him (select appropriate view before allocating).

	1/18/2017	1/19/2017	1/20/2017	1/21/2017	1/22/2017	1/23/2017	1/24/2017	1/25/2017	1/26/2017
	Wednesday	Thursday	Friday	Saturday	Sunday	Monday	Tuesday	Wednesday	Thursday
	23	1							

↑ ↑ ↑

Select the dates

Click on Book button



Upon clicking on the book button, the following screen comes up

Create Resource Booking

Requirement ↑	Work Type	Start Date	End Date	Duration
		1/2/2017	1/2/2017	8 hrs
123 customization project	Project	12/19/2016	1/19/2017	0 hr
123 customization project	Project	12/20/2016	1/2/2017	1 hr
123 customization project - Developer	Project	12/29/2016	1/5/2017	14 hrs
123 customization project - Project M...	Project	12/19/2016	12/28/2016	60 hrs
123 customization project - Solution A	Project	12/30/2016	1/3/2017	16 hrs

Booking Summary

Resource:	Kuldeep Gupta	Start Date:	1/17/2017
Booking Status:	Committed	End Date:	1/17/2017
Booking Method:	Specify hours	Allocation type:	<input type="radio"/> Front load <input checked="" type="radio"/> Distribute evenly
Hours:	1		

Book Close

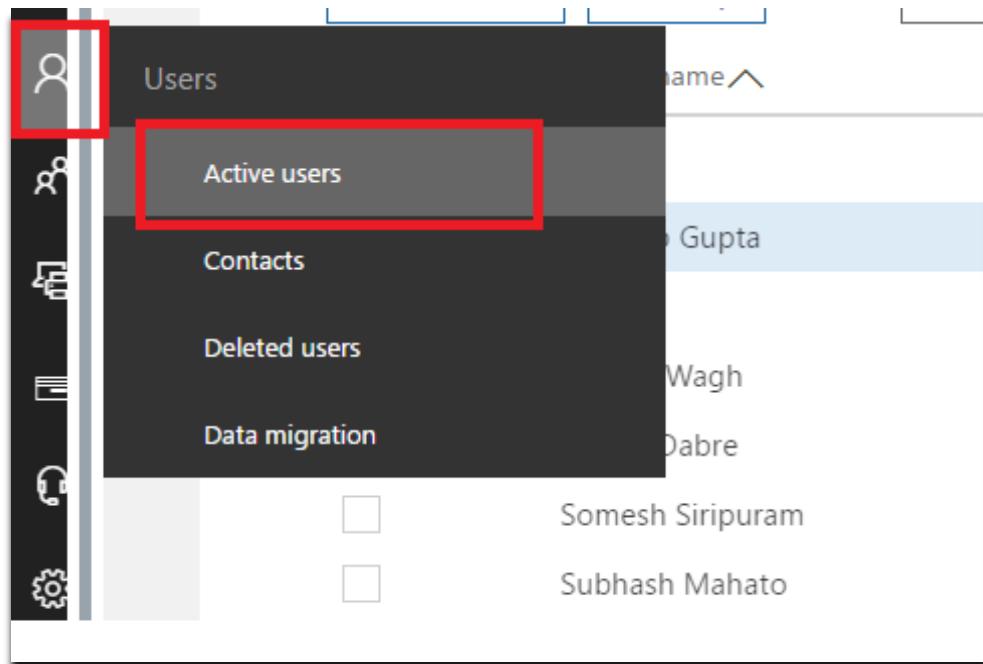
After making the right selection for Filter Type, booking Status, Booking Method, Start Date, End Date and Allocation Type you can hit on Book button and the booking gets created for the resource.

The same is also visible in the calendar of the Resource.

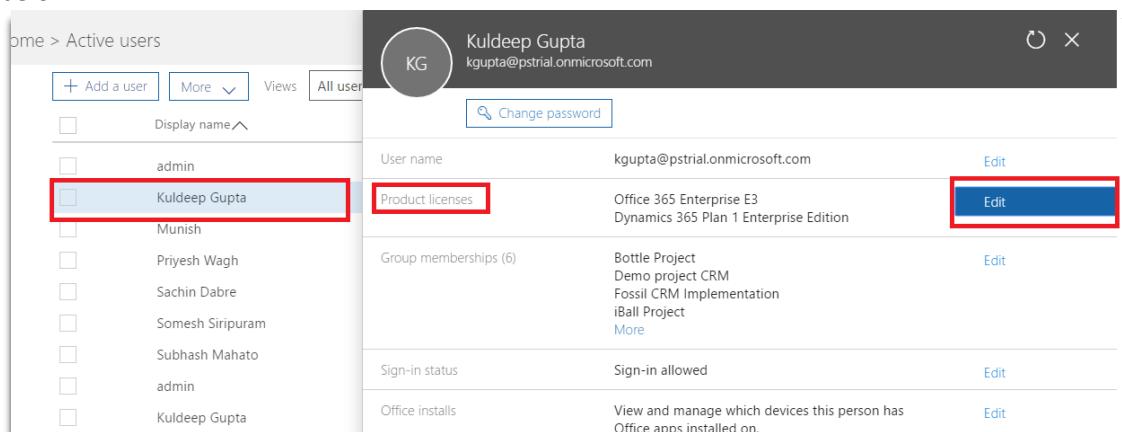
To make sure the booking gets reflected in the calendar the following configurations needs to be taken care of.

Configurations to reflect allocation in Calendar

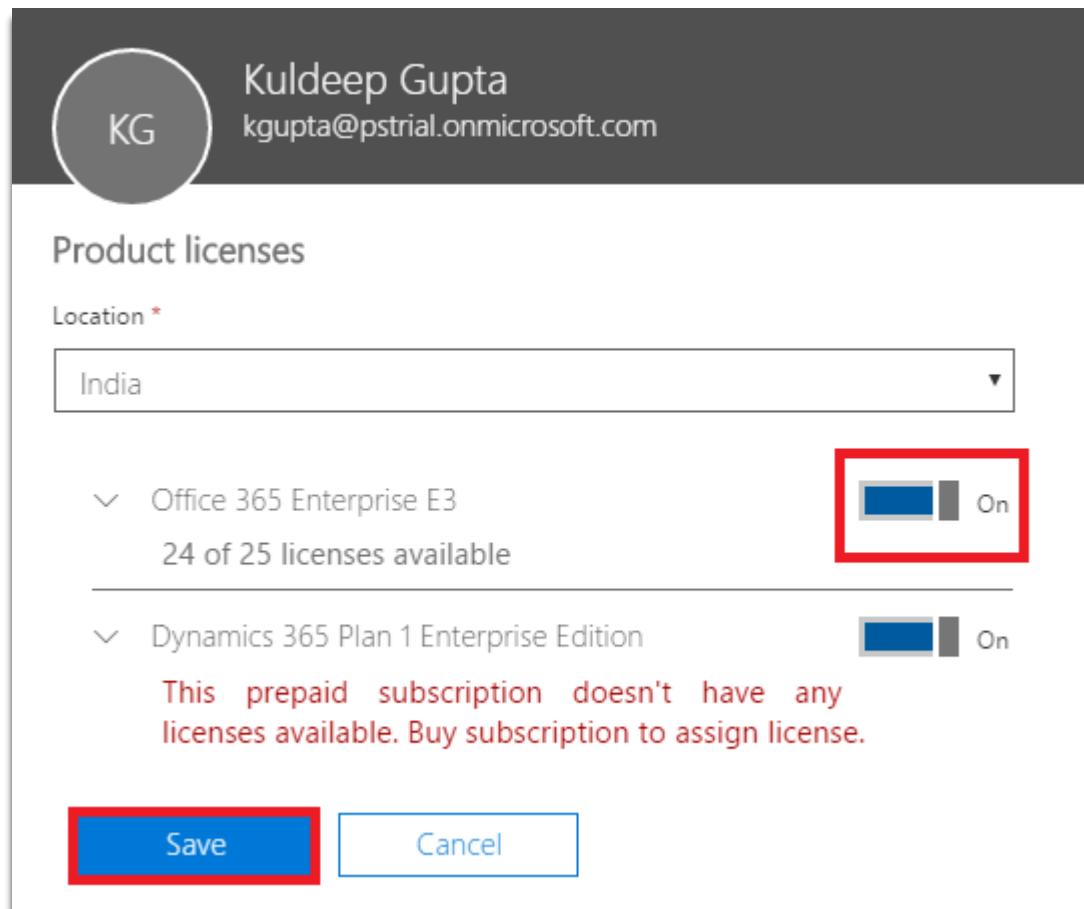
1. Make sure the user is assigned with Office 365 E3 licenses. To verify/assign the same, follow the steps below:
 - a. Login to admin portal (<https://portal.office.com>)
 - b. Login with the admin user credentials.
 - c. Click on the Users→Active Users



d. Select the user and navigate to Product licenses and hit on Edit Button as shown below.



e. Turn on the Office 365 Enterprise E3 license button and you are set.



Kuldeep Gupta
kgupta@pstrial.onmicrosoft.com

Product licenses

Location *

India

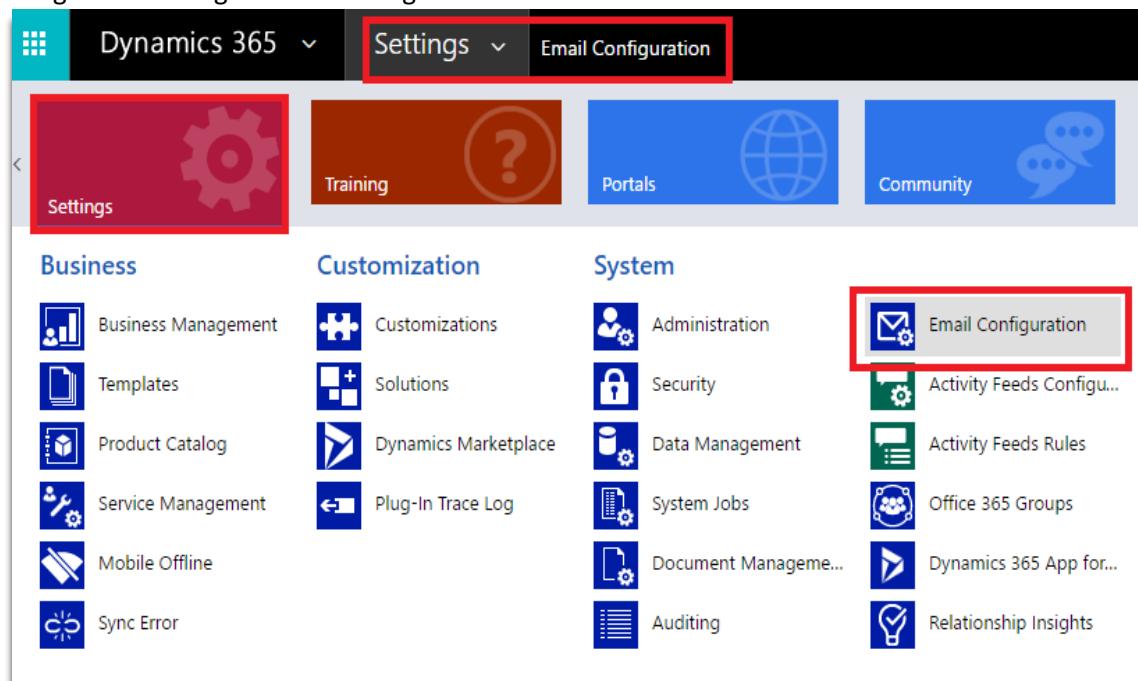
Office 365 Enterprise E3
24 of 25 licenses available On

Dynamics 365 Plan 1 Enterprise Edition On
This prepaid subscription doesn't have any licenses available. Buy subscription to assign license.

Save Cancel

2. Enable Server Side sync

a. Navigate to Settings → Email Configuration



Dynamics 365 Settings Email Configuration

Settings Training Portals Community

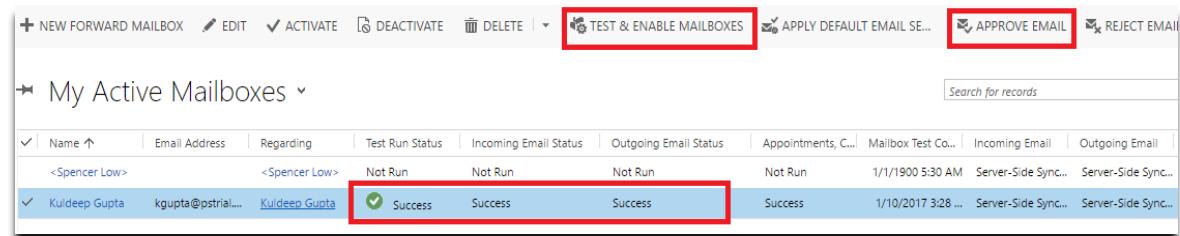
Business	Customization	System
Business Management	Customizations	Administration
Templates	Solutions	Security
Product Catalog	Dynamics Marketplace	Data Management
Service Management	Plug-In Trace Log	System Jobs
Mobile Offline		Document Management
Sync Error		Auditing
		Email Configuration Email Configuration
		Activity Feeds Configuration
		Activity Feeds Rules
		Office 365 Groups
		Dynamics 365 App for...
		Relationship Insights

b. Click on Mailboxes

do?

- Profiles**
channel by creating an email server profile and adding mailboxes to it.
- Mail Router Data**
m the Microsoft Dynamics 365 Email Router for processing email through server-side synchronization.
- Synchronization Monitoring**
itor the performance of server-side synchronization.
- Mailboxes**
Manage mailboxes of Microsoft Dynamics 365 users.
- Email Configuration Settings**
Set system-level email settings for your organization.

c. Select the user and Hit on “APPROVE EMAIL” button from the Ribbon Control.
 d. Once the email is approved, we need hit the “TEST & ENABLE MAILBOXES” button from the Ribbon Control.
 e. You should see “success” for “Test Run Status”, “Incoming Email Status” & “Outgoing Email Status”



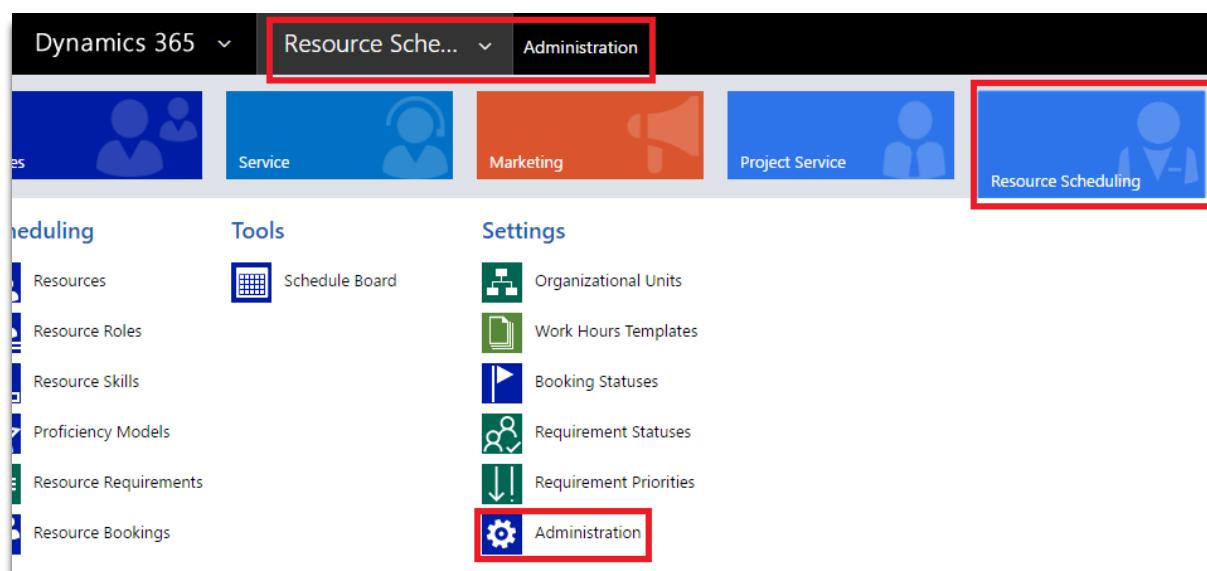
Name	Email Address	Regarding	Test Run Status	Incoming Email Status	Outgoing Email Status	Appointments, C...	Mailbox Test Co...	Incoming Email	Outgoing Email
<Spencer Low>	<Spencer Low>		Not Run	Not Run	Not Run	Not Run	1/1/1900 5:30 AM	Server-Side Sync...	Server-Side Sync...
Kuldeep Gupta	kgupta@pstrial...	Kuldeep Gupta	Success	Success	Success	Success	1/10/2017 3:28 ...	Server-Side Sync...	Server-Side Sync...

3. Once the above settings are done and the resource is scheduled from the schedule board, the allocations are reflected in the O365 Calendar for that user.

Enable Case and other entities for scheduling

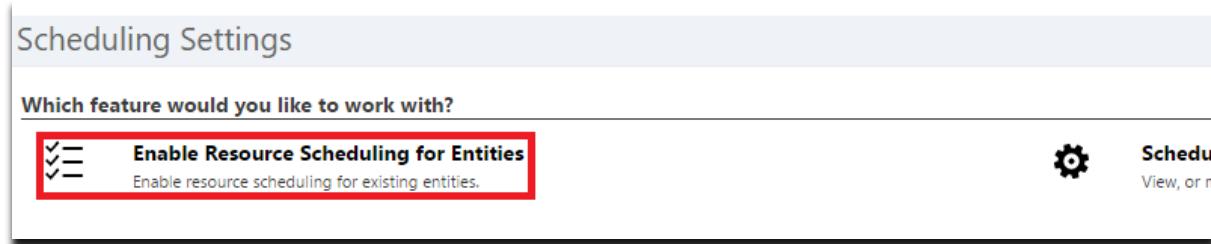
To facilitate allocating resource on Cases apart from the project Tasks, following configurations needs to be done.

Navigate to Resource Scheduling → Administration



Resources	Schedule Board	Organizational Units
Resource Roles		Work Hours Templates
Resource Skills		Booking Statuses
Proficiency Models		Requirement Statuses
Resource Requirements		Requirement Priorities
Resource Bookings		Administration

Click on “Enable Resource Scheduling for Entities”



In the Enable New Entity Section Add the following details:

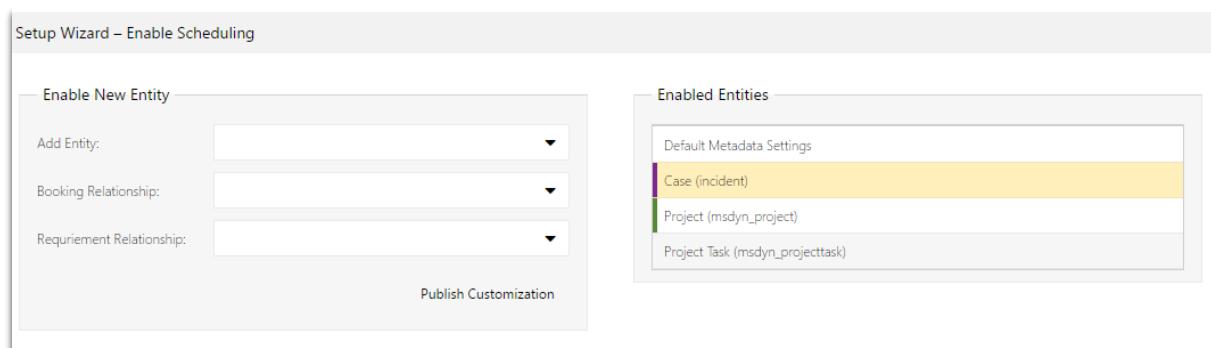
Add Entity: Case (incident)

Booking Relationship: provide a logical name to this.

Requirement Relationship: make sure this is set to “msdyn_committype”

And then hit “Publish Customization” button.

As soon as you hit Publish Customization button it appears in the “Enabled Entities section”.



Building a Team from WBS

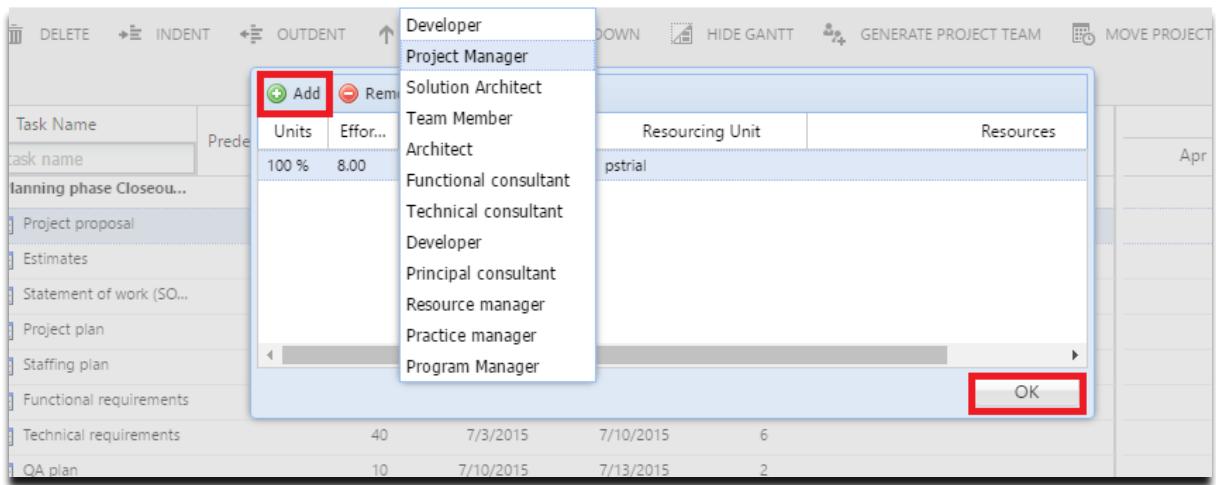
This is another way from where we can build a team for our project and allocate resources for the same. The process to do so is as follows:

Post the project plan is prepared in the Gantt Chart. Allocate the Roles to each task.

For allocation Roles to the task, click on the “Assigned Roles” Column of the Task. Hit the drop-down icon and a pop up appears where we can assign the Roles.

Task Mo...	WBS ID	Task Name	Predece...	Effort H...	Start Date	End Date	Duration	Assigned Roles	Resources
	1	Planning phase Closeou...		204	7/1/2015	7/14/2015	10	Search for assign	Search for resources
	1.1	Project proposal		8	7/1/2015	7/1/2015	1		
	1.2	Estimates		24	7/2/2015	7/6/2015	3		

Click on Add Button in the popup and select the Role from the drop down.



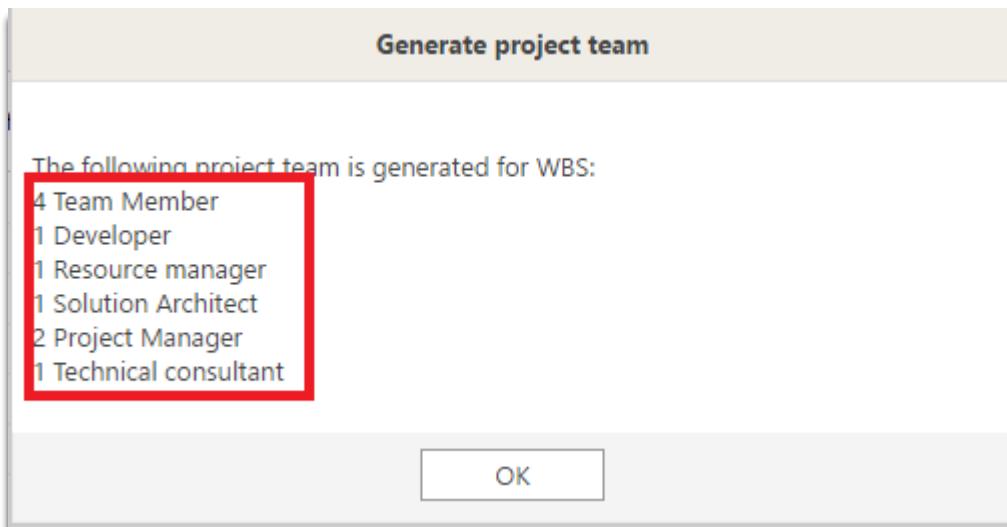
Do this for all the tasks in the Gantt Chart.

WBS ID	Task Name	Predece...	Effort H...	Start Date	End Date	Duration	Assigned Roles	Resources
	Search for task name						Search for assign	Search for resources
1	Planning phase Closeou...		204	7/1/2015	7/14/2015	10		
1.1	Project proposal		8	7/1/2015	7/1/2015	1	Project Manager	
1.2	Estimates		24	7/2/2015	7/6/2015	3	Solution Architect	
1.3	Statement of work (SO...		10	7/2/2015	7/3/2015	2	Project Manager	
1.4	Project plan		20	7/3/2015	7/7/2015	3	Project Manager	
1.5	Staffing plan		10	7/3/2015	7/6/2015	2	Resource mana...	
1.6	Functional requirements		40	7/3/2015	7/9/2015	5	Developer	
1.7	Technical requirements		40	7/3/2015	7/9/2015	5	Technical consul...	

Post we are done with assigning roles to all the tasks, Hit, "GENERATE PROJECT TEAM" button on the WBS Ribbon.

REFRESH	ADD TASK	DELETE	INDENT	OUTDENT	MOVE UP	MOVE DOWN	HIDE GANTT	GENERATE PROJECT TEAM	MOVE PROJ
Year									
Task Mo...	WBS ID	Task Name	Predece...	Effort H...	Start Date	End Date	Duration	Assigned Roles	Resources
		Search for task name						Search for assign	Search for resources
		Closeout boutique POS							
	1	Planning phase Closeou...		204	7/1/2015	7/14/2015	10		
	1.1	Project proposal		8	7/1/2015	7/1/2015	1	Project Manager	
	1.2	Estimates		24	7/2/2015	7/6/2015	3	Solution Architect	
	1.3	Statement of work (SO...		10	7/2/2015	7/3/2015	2	Project Manager	

Post the team is created we get the following message.

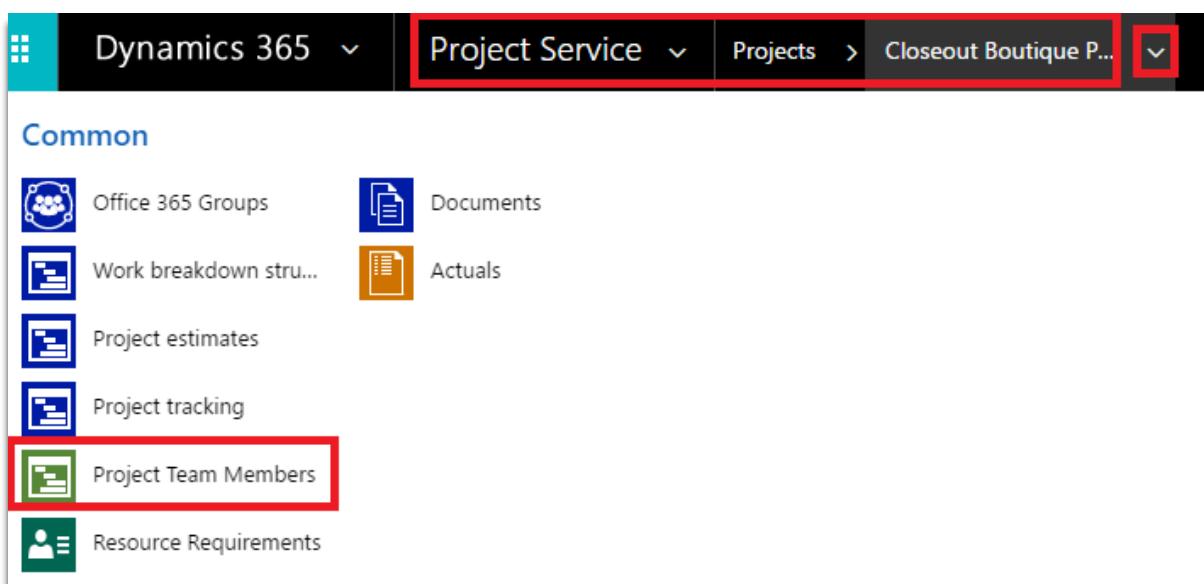


If you observe carefully we see 4 Team Member in the team. In case there are any task to which we did not assign any role, they get allocated as Team Member. These resources with Team Member role can be selected for any Role while Resource booking.

All the above resources are generic resources, which needs to be patched with proper resources.

How do you Book the resources for the Team generated via WBS?

For booking the Physical Resource versus the Generic Resource, you need to navigate to Project Services→Projects→Project Name→Project Team Members



We see a “Project Team Members Associated View”, where you see the Bookable Resource as “Generic Resource” along with their appropriate Roles and other details like From and To Date, Required Hours, etc.

Project Team Members Associated View

+ NEW  MAINTAIN BOOKINGS  SUBMIT REQUEST  CONFIRM  ENABLE RESOURCE SIGNUP  EXCEL TEMPLATES  EXPORT PROJECT TEAM ... | ▾

✓ Bookable Resource ↑	Role ↑	Position Name	From	To	Required Hou...	Booked Hours	Soft Book	A
Generic Resource	Developer	Developer 1	7/3/2015	7/9/2015	40.00			
Generic Resource	Project Manager	Project Manage...	7/1/2015	7/3/2015	18.00			
Generic Resource	Project Manager	Project Manage...	7/3/2015	7/7/2015	20.00			
Generic Resource	Resource mana...	Resource mana...	7/3/2015	7/6/2015	10.00			
Generic Resource	Solution Archite...	Solution Archite...	7/2/2015	7/6/2015	24.00			
Generic Resource	Team Member	Team Member 1	7/10/2015	12/28/2015	927.00			

There are 2 options now to allocate resource:

1. Hard book

- This will book the resource by directly consulting with the intended resource.

+ NEW  MAINTAIN BOOKINGS  EDIT  SUBMIT REQUEST  CONFIRM  ENABLE RESOURCE SIGNUP  DEL

✓ Bookable Resource ↑	Role ↑	Position Name	From	To	Required Hou...	Booked Ho
✓ Generic Resource	Developer	Developer 1	7/3/2015	7/9/2015	40.00	

Based on the Requirement the Filters are applied and the Resources are shown

Filters

Business Units
Select Business Units

Resource Types
Select Resource Types

- Contact 
- User 

Teams
Select Teams

Roles
Select Roles

Skills
Select Skills

Match Resources Using
Skills in Profile

RESET **APPLY**

Book Resources

Closeout Boutique PoS... Required Capacity: 40 Hours

Search 

7/3/2015 - 7/9/2015   

	JULY	JULY
3		5
	8	32

	JULY	JULY
3		5

1 - 3 of 3

To book a resource, select the resource, you see the menu changes and “BOOK” button is visible. Before we hit on “BOOK” button to book the resource we have multiple options that we can select to make the booking and change the way the details can look on the screen. For checking the various options available, click “OPTIONS” button.

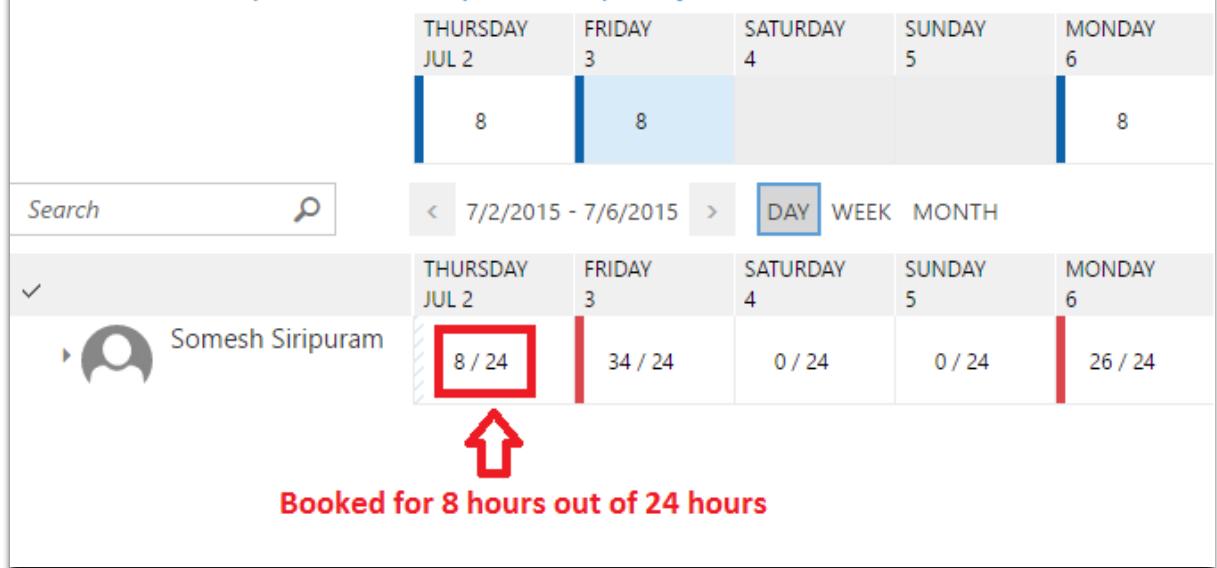
Let's visit at what each option mean to us:

Show Capacity In Hours:

This shows the hours booked versus the hours in a day for resource.

Book Resources

Closeout Boutique PoS... Required Capacity: 24 Hours

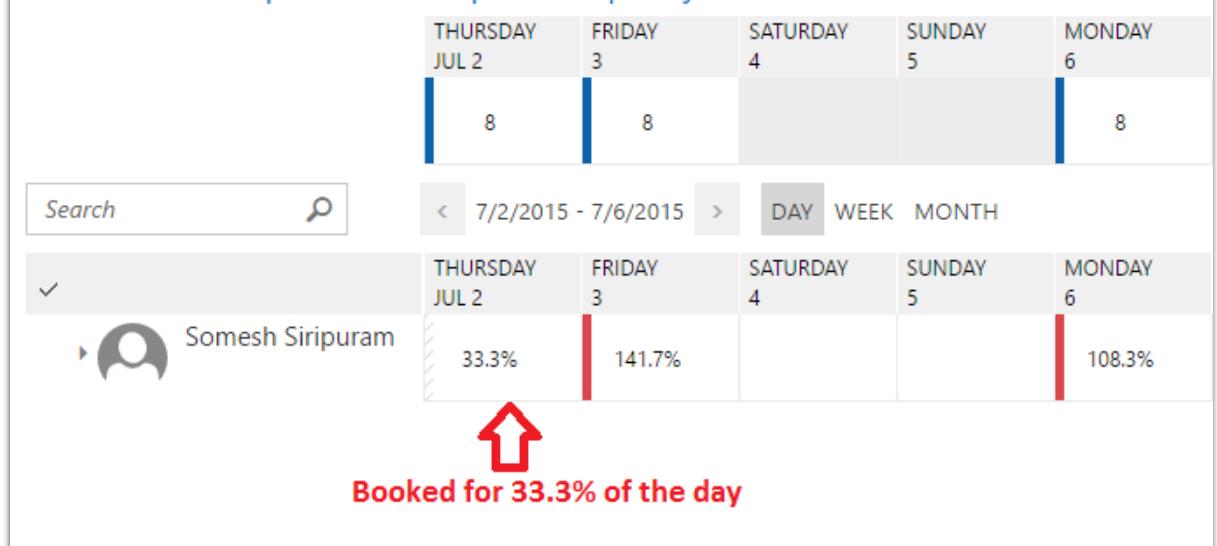


Show Booked Percentage

It shows the booking of the resource in percentage.

Book Resources

Closeout Boutique PoS... Required Capacity: 24 Hours

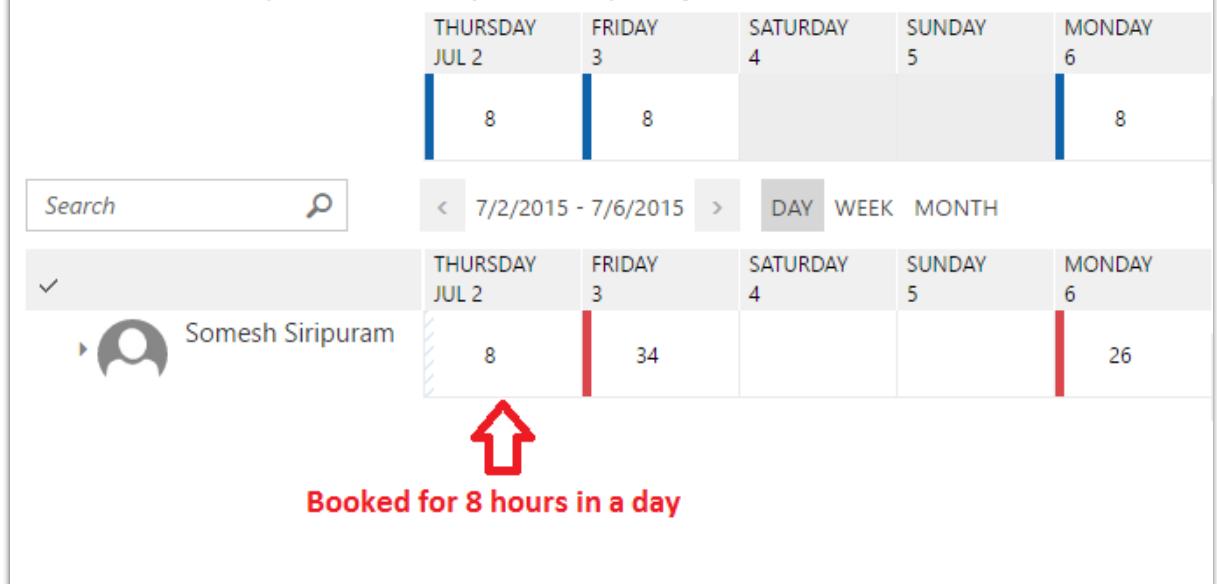


Show Legend

This shows only the no of hours booked in a day.

Book Resources

Closeout Boutique PoS... Required Capacity: 24 Hours



Booking Display Type

There are 3 types of bookings that can be done in the system.

1. Hard Booking
2. Soft Booking
3. Proposed Booking

Each of the type when selected shows the no of hours the resource is Hard booked, Soft Booked or Proposed for booking.

Distribution Method

There are in all 4 distribution Method that can be selected out of the 4 available options:

1. *Proportional:*

This will book the resource for the remaining proportion of the day. For e.g. if a resource is booking for 22 hours in a day then he will be allocated only for remaining 2 hours of the day and the rest will push ahead for the next day.

2. *Front Load*

This will start allocating the resource for 8 hours each day until the number of hours to be allocated are exhausted.

3. *Equal*

This will allocate the resource for equal duration between the Start and End Date. for e.g. if the resource needs to be booked for 8 hours for 4 days then he shall be booked for 2 hours each day.

4. *Total*

This will allocate the resource in total on the Start Date of the task.

Force Refresh

This refreshes all the allocation on the main form.

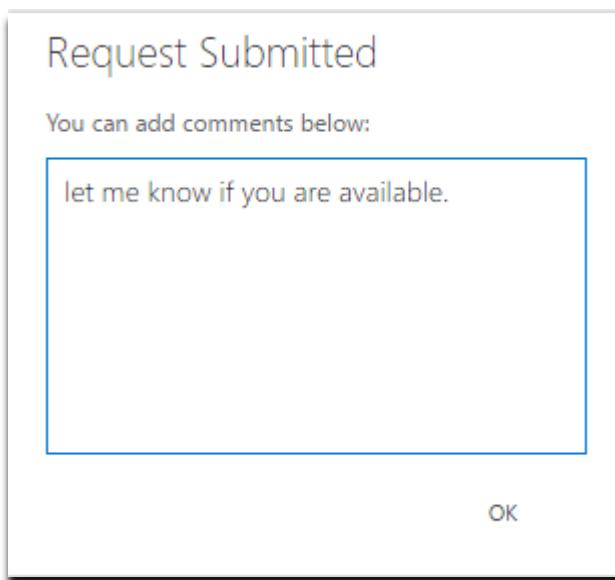
2. Submit Request

a. Here, we Submit the request for a role and interested candidates may apply for that role. Project Managers or Resource Manager who is responsible for staffing can approve the applications received.

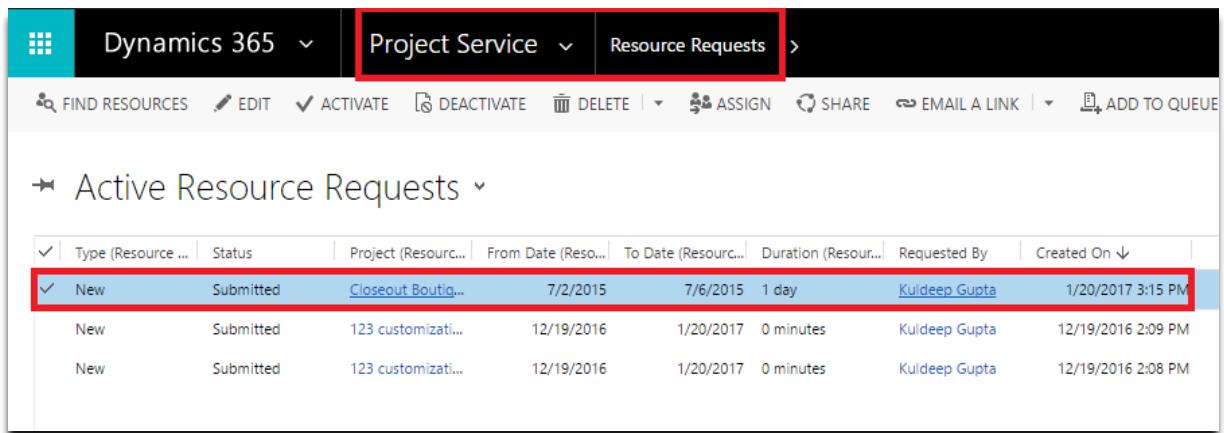
For Submitting the request for the resource, navigate to Project Services → Projects → “Project Name” and click on “SUBMIT REQUEST” button.

Project Team Members Associated View								
<input type="button" value="NEW"/>	<input type="button" value="HARD BOOK"/>	<input type="button" value="MAINTAIN BOOKINGS"/>	<input type="button" value="EDIT"/>	<input style="border: 2px solid red;" type="button" value="SUBMIT REQUEST"/>	<input type="button" value="CONFIRM"/>	<input type="button" value="ENABLE RESOURCE SIGNUP"/>	<input type="button" value="DELETE"/>	<input type="button" value="SHARE"/>
✓ Bookable Resource ↑	Role ↑	Position Name	From	To	Required Hou...	Booked Hours	Soft Book	
✓ Generic Resource	Solution Archite...	Solution Archite...	7/2/2015	7/6/2015	24.00			
Generic Resource	Team Member	Team Member 1	7/10/2015	7/2/2015/28/2015	927.00			
Generic Resource	Team Member	Team Member 2	7/10/2015	12/28/2015	70.00			
Generic Resource	Team Member	Team Member 3	7/10/2015	11/13/2015	30.00			
Generic Resource	Team Member	Team Member 4	7/13/2015	11/13/2015	34.00			
Somesh Siripuram	Resource mana...		7/1/2015	7/9/2015		128.00		

After you hit the “SUBMIT REQUEST” button there is a pop-up that comes up where in you can put in the additional comments while submitting the request.



After the request is Submitted, the Resource Manager can check the resource requests from Project Services → Resource Requests



✓	Type (Resource ...	Status	Project (Resourc...	From Date (Reso...	To Date (Resourc...	Duration (Resour...	Requested By	Created On
✓	New	Submitted	Closeout Boutiq...	7/2/2015	7/6/2015	1 day	Kuldeep Gupta	1/20/2017 3:15 PM
	New	Submitted	123 customizati...	12/19/2016	1/20/2017	0 minutes	Kuldeep Gupta	12/19/2016 2:09 PM
	New	Submitted	123 customizati...	12/19/2016	1/20/2017	0 minutes	Kuldeep Gupta	12/19/2016 2:08 PM

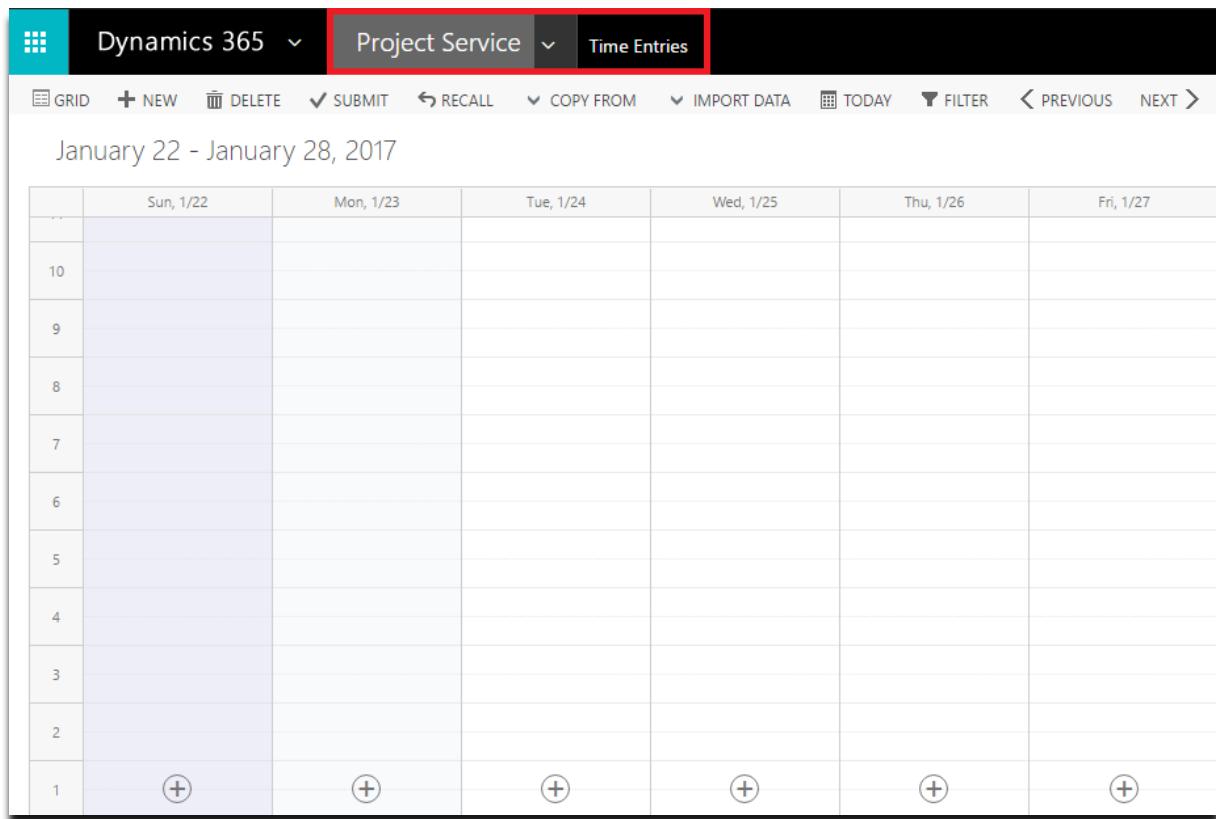
The Resource can then be appropriately be booked by clicking on “FIND RESOURCE” which will open the same booking window as we have already seen before while Hard booking the resource.

Time & Expense Entry

Time Entry

We saw how the Project Manager plans the project, creates the WBS and how he allocates and schedules the resources in Part 3 of this e-book. In this book, we shall see how the resources will do the time entry and how the billing administrator will invoice the same.

For doing the time entry you can navigate to Project Service → Time Entries

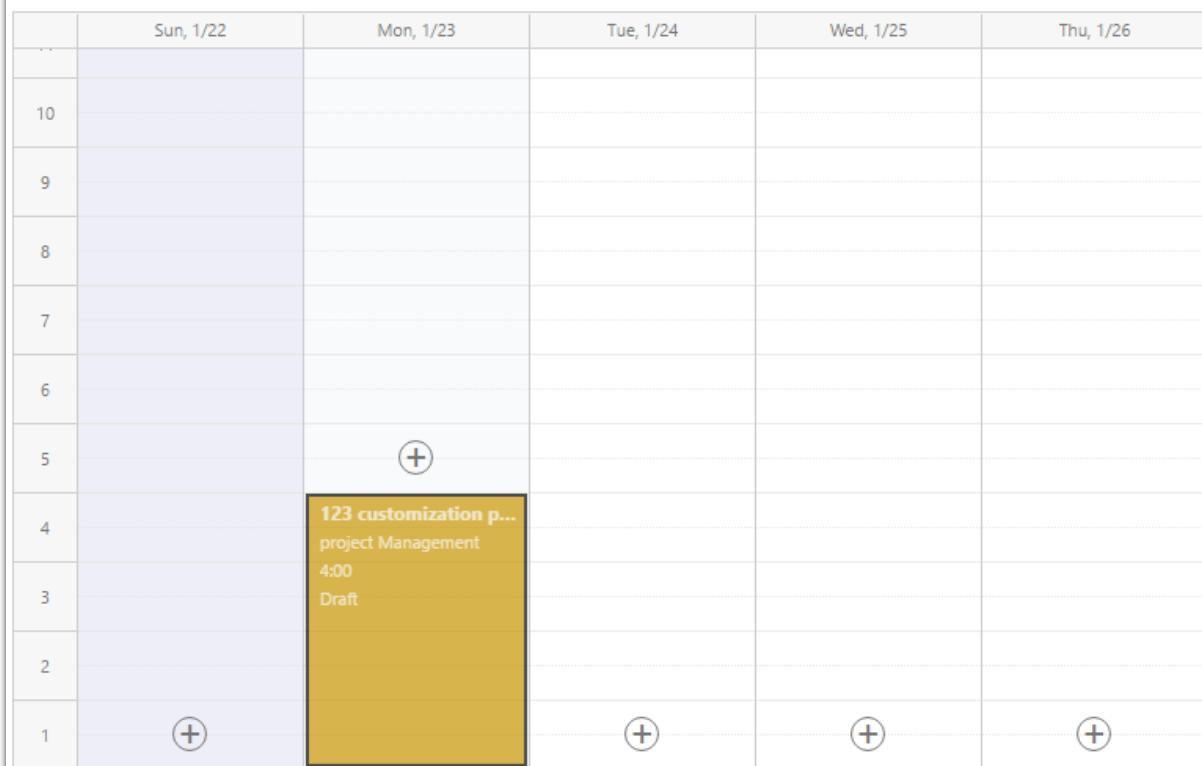


For doing the Time Entry we can hit the + button on the day when we need to do the time entry.

The following pop-up comes up where we need to enter, the Duration, Type, whether it was a Work, Absence or Vacation, Select the Project, Project Task, Select the Role and Add internal as well as external comments and save the time entry.

As soon as the time entry is done it appears on the calendar as shown below.

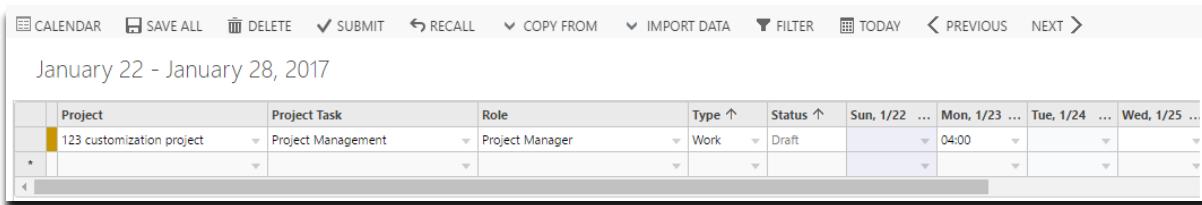
January 22 - January 28, 2017



We see the Calendar View in the above screenshot. We also can toggle to Grid View by Hitting the “GRID” button in the Ribbon Control.



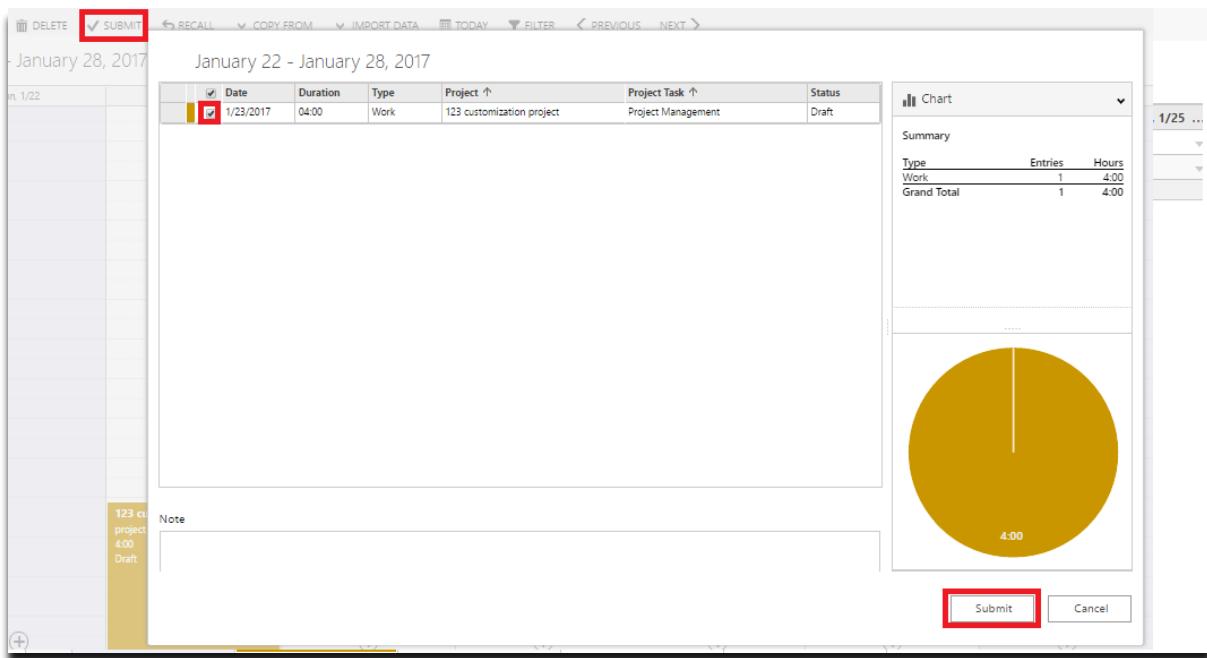
The Grid View Looks something like below:



	Project	Project Task	Role	Type ↑	Status ↑	Sun, 1/22 ...	Mon, 1/23 ...	Tue, 1/24 ...	Wed, 1/25 ...
*	123 customization project	Project Management	Project Manager	Work	Draft	04:00			
*									
4									

When all the time entries have been done, you can submit them by hitting the Submit button.

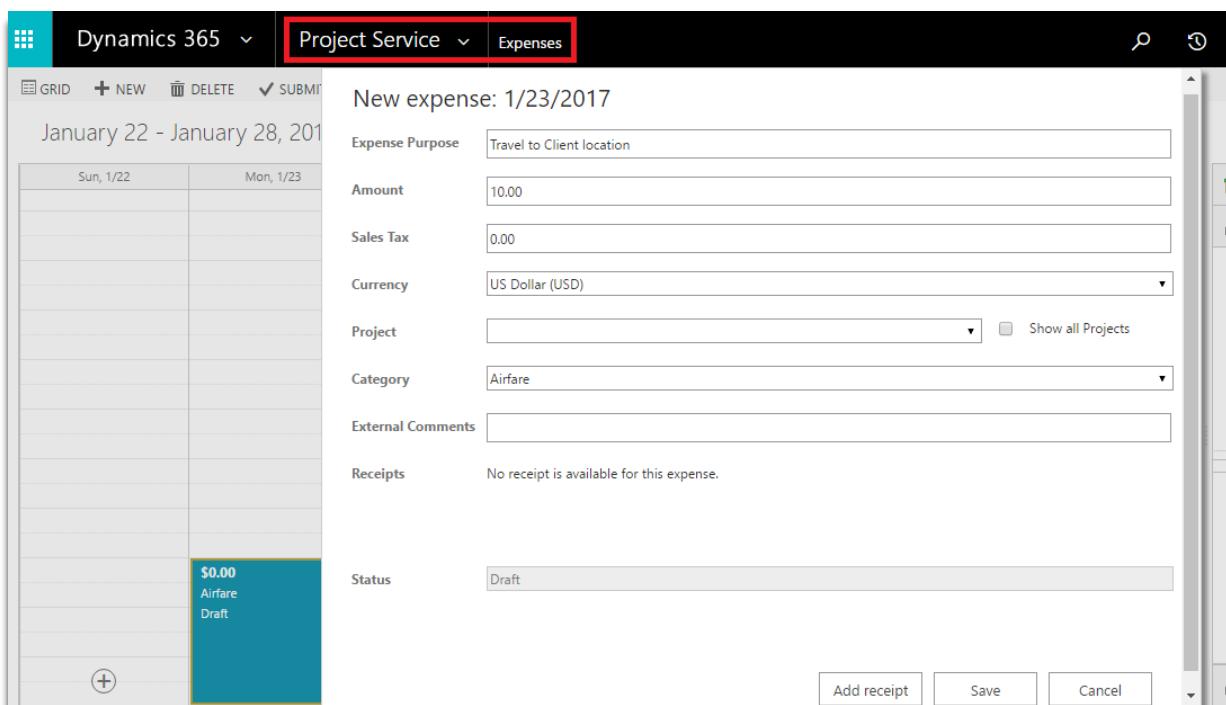
A popup comes where you can select the entries that you wish to Submit.



The screenshot shows a Dynamics 365 Project Service interface. At the top, there are buttons for 'DELETE', 'SUBMIT' (highlighted with a red box), 'RECALL', 'COPY FROM', 'IMPORT DATA', 'TODAY', 'FILTER', 'PREVIOUS', and 'NEXT'. The date range is set to 'January 22 - January 28, 2017'. The main grid shows a single entry: Date 1/23/2017, Duration 04:00, Type Work, Project 123 customization project, Project Task Project Management, and Status Draft. To the right of the grid is a 'Chart' section with a summary table and a pie chart. The summary table shows 1 entry and 4:00 hours for Work. The pie chart is yellow and labeled '4:00'. At the bottom right are 'Submit' and 'Cancel' buttons, with 'Submit' also highlighted with a red box.

Expense Entry

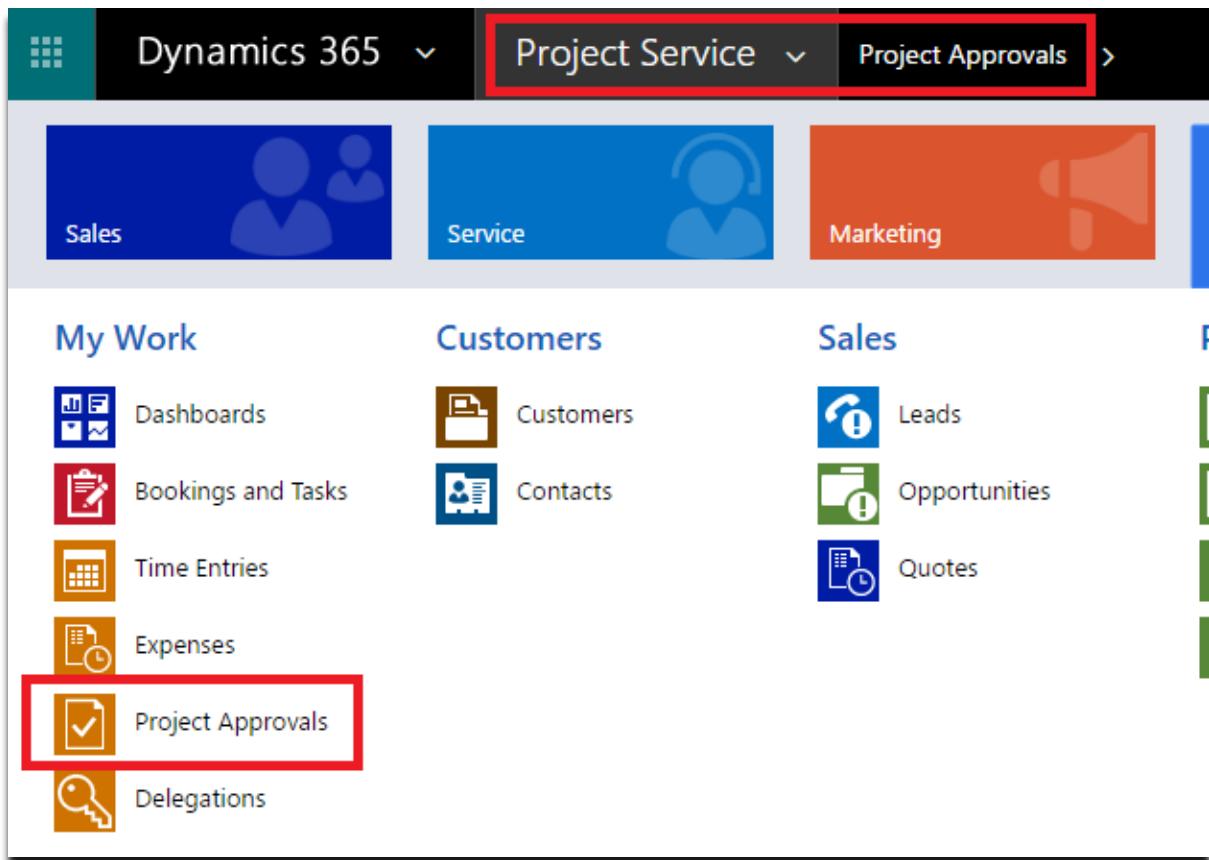
Like Time Entries we can also bill for the expenses incurred during the project. For raising the expense, you can navigate to Project Service→Expenses



The screenshot shows a Dynamics 365 Project Service interface for creating a new expense. The top navigation bar includes 'Dynamics 365', 'Project Service' (highlighted with a red box), and 'Expenses'. The date range is 'January 22 - January 28, 2017'. The form fields are: Expense Purpose (Travel to Client location), Amount (10.00), Sales Tax (0.00), Currency (US Dollar (USD)), Project (dropdown with 'Show all Projects' checkbox), Category (Airfare), External Comments (empty), Receipts (No receipt is available for this expense), and Status (Draft). At the bottom are 'Add receipt', 'Save' (highlighted with a red box), and 'Cancel' buttons.

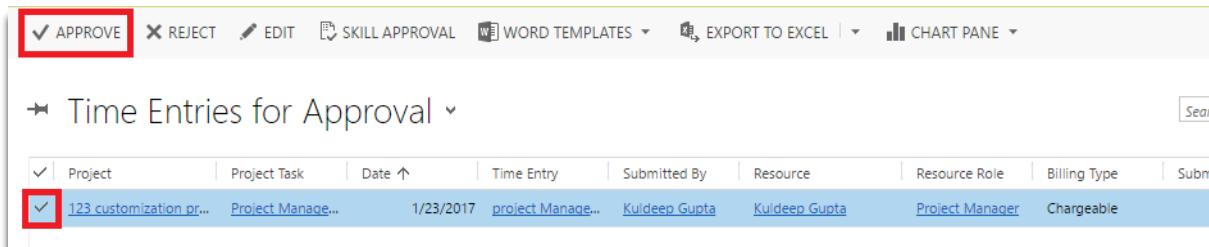
Time and Expense Entry Approval

Submitted Time Entries and Expenses waits for the project manager to Approve them. The project manager can navigate to Project Service→Project Approvals.



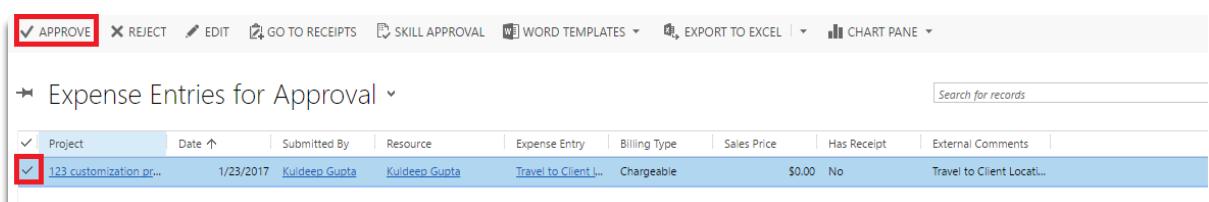
The screenshot shows the Dynamics 365 Project Service ribbon. The 'Project Approvals' tab is highlighted with a red box. Below the ribbon, there are three main sections: Sales (blue), Service (blue), and Marketing (orange). Each section has a large icon and a title. Under the 'My Work' section, the 'Project Approvals' icon (a checkmark inside a box) is also highlighted with a red box.

A list of entries from all the resources for all the projects that the project manager is responsible is shown up in “Time Entries for Approval” and “Expense Entries for Approval” view respectively and approve them by hitting the “APPROVE” button from the Ribbon control.



The screenshot shows the 'Time Entries for Approval' view. The 'APPROVE' button is highlighted with a red box. A single entry is selected, indicated by a red box around the checkbox in the first column.

Project	Project Task	Date	Time Entry	Submitted By	Resource	Resource Role	Billing Type	Subm...
123 customization pr...	Project Manage...	1/23/2017	project Manage...	Kuldeep Gupta	Kuldeep Gupta	Project Manager	Chargeable	



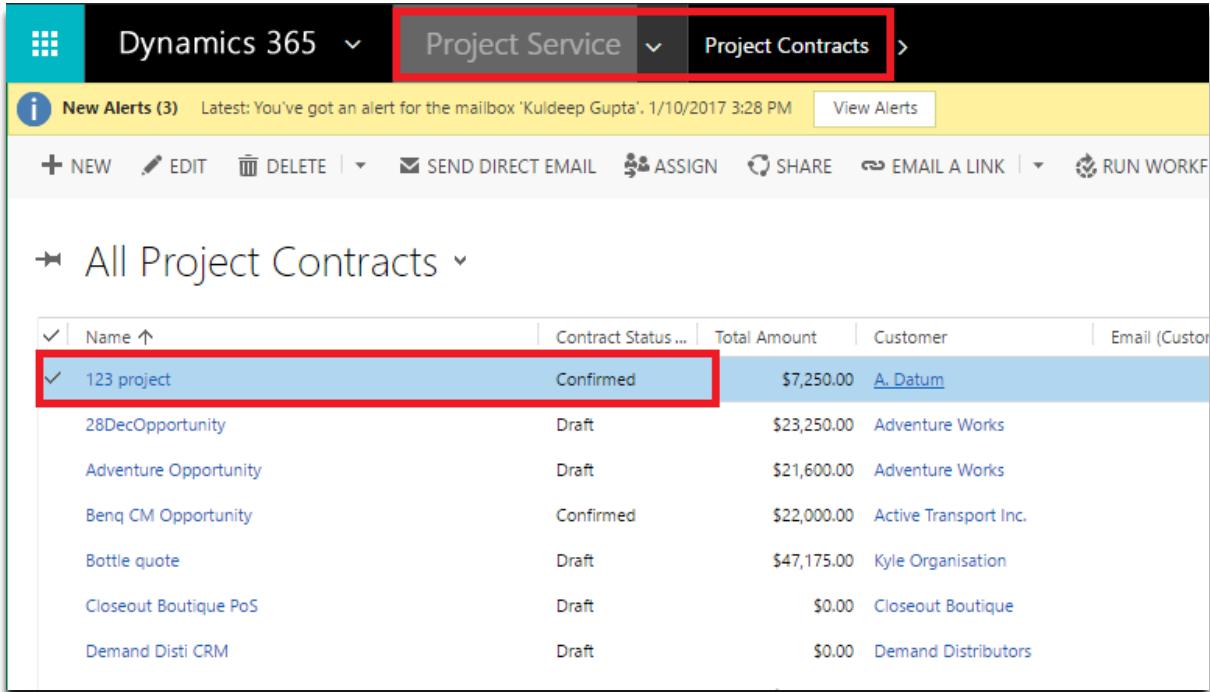
The screenshot shows the 'Expense Entries for Approval' view. The 'APPROVE' button is highlighted with a red box. A single entry is selected, indicated by a red box around the checkbox in the first column.

Project	Date	Submitted By	Resource	Expense Entry	Billing Type	Sales Price	Has Receipt	External Comments
123 customization pr...	1/23/2017	Kuldeep Gupta	Kuldeep Gupta	Travel to Client...	Chargeable	\$0.00	No	Travel to Client Locati...

Invoicing

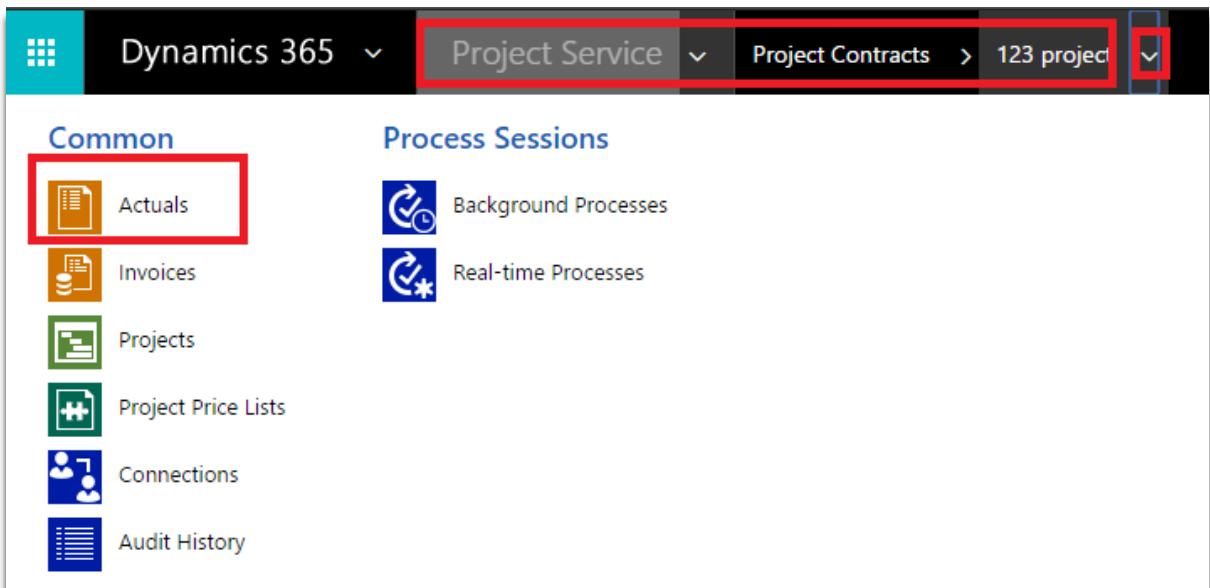
After the project time entries are submitted it's the job of Billing Administrator to generate Invoice and Submit it to the client.

Invoicing in PSA is always generated from Project Contract. Hence, to generate the billing we need to navigate to Project Service → Project Contracts → “XYZ Project Contract”



Name	Contract Status	Total Amount	Customer	Email (Customer)
123 project	Confirmed	\$7,250.00	A. Datum	
28DecOpportunity	Draft	\$23,250.00	Adventure Works	
Adventure Opportunity	Draft	\$21,600.00	Adventure Works	
Benq CM Opportunity	Confirmed	\$22,000.00	Active Transport Inc.	
Bottle quote	Draft	\$47,175.00	Kyle Organisation	
Closeout Boutique Pos	Draft	\$0.00	Closeout Boutique	
Demand Disti CRM	Draft	\$0.00	Demand Distributors	

Upon opening the project contract navigate to “Actuals” as shown below:



Common

-  [Actuals](#)
-  [Invoices](#)
-  [Projects](#)
-  [Project Price Lists](#)
-  [Connections](#)
-  [Audit History](#)

Process Sessions

-  [Background Processes](#)
-  [Real-time Processes](#)

You see an “Actual Associated View” where we can see all the approved Time and Expense entries by the Project Manager as shown below.

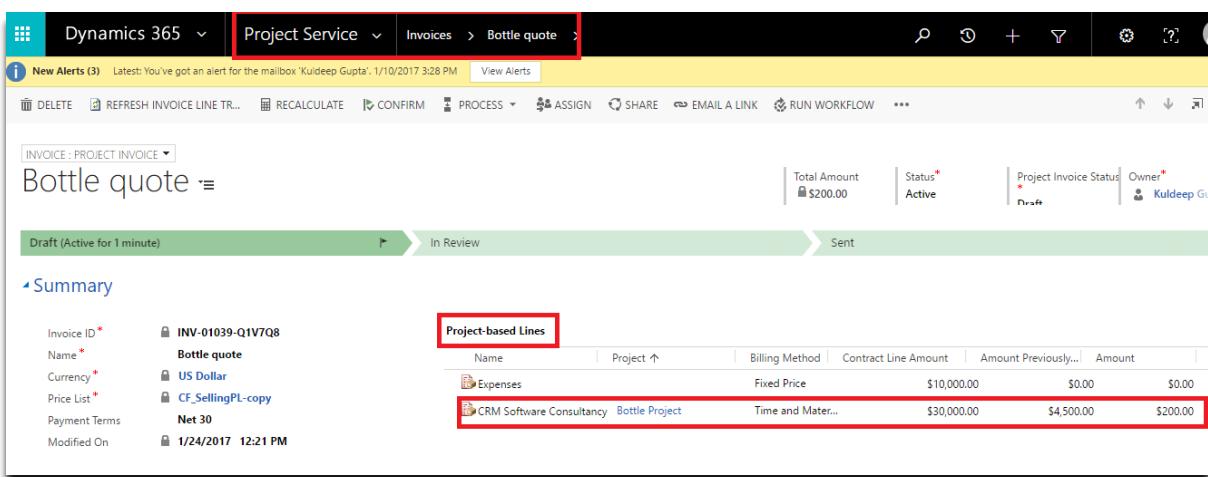
Actual Associated View

Actual Associated View											
CHART PANE		RUN REPORT		EXCEL TEMPLATES		EXPORT ACTUALS		Search for records			
Transaction Ty...	Transaction Cl...	Document Da...	Start Date/Ti...	End Date/Ti...	Project ID	Task ID	Transaction ca...	Contracting U...	Resourcing U...	Quantity	Unit of measu...
Cost	Material	12/19/2016	12/19/2016 12...	12/19/2016 12...						10.00	Primary Unit
Billed Sales	Time	12/27/2016	12/27/2016 12...	12/27/2016 12...	123 customizati...	Project Manage...	Time	CloudFronts Tec...		10.00	Hour
Cost	Time	1/23/2017	1/23/2017 5:30...	1/23/2017 5:30...	123 customizati...	Project Manage...		CloudFronts Tec...	CloudFronts Tec...	4.00	Hour
Unbilled Sales	Time	1/23/2017	1/23/2017 5:30...	1/23/2017 5:30...	123 customizati...	Project Manage...		CloudFronts Tec...	CloudFronts Tec...	4.00	Hour
Cost	Expense	1/23/2017	1/23/2017 5:30...	1/23/2017 5:30...	123 customizati...		Airfare	CloudFronts Tec...	CloudFronts Tec...	1.00	Primary Unit
Unbilled Sales	Expense	1/23/2017	1/23/2017 5:30...	1/23/2017 5:30...	123 customizati...		Airfare	CloudFronts Tec...	CloudFronts Tec...	1.00	Primary Unit

If you observe one entry is of the type Time and one is of the type Expense.

To generate the Invoice, navigate to the Project Service → Project Contracts → "XYZ Project Contract" and Hit the "CREATE INVOICE" Button.

This will create the invoice and automatically navigate us to Invoices Entity.



INVOICE : PROJECT INVOICE

Bottle quote

Total Amount: \$200.00 Status: Active Project Invoice Status: Owner: Kuldeep Gu

Project-based Lines

Name	Project	Billing Method	Contract Line Amount	Amount Previously...	Amount
Expenses		Fixed Price	\$10,000.00	\$0.00	\$0.00
CRM Software Consultancy	Bottle Project	Time and Mater...	\$30,000.00	\$4,500.00	\$200.00

Project Base Lines shall show all the Time and Expense Entries done on the project and Product Based Grid shall show all the Product purchased for this project, for e.g. Licenses. For which we do Milestone based billing. If the milestone has achieved the bill will automatically get generated and an invoice shall be created for the same.

There is an Invoice Report which gives you an Invoice which can be saved in multiple formats and can be send out to the customers.



INVOICE

quote

Total Amount: \$200.00

1 minute In Review Sent

Run Report

1 of 1 Find | Next

Invoice: pstrial

To:
Kyle Organisation
98th St Rivers
New York, NY 8745

From:
Kuldeep Gupta

Summary

Total Amount:	\$200.00	Invoice ID:	INV-01039-Q1V7Q8
Shipping Method:		Date:	1/24/2017
Payment Terms:	Net 30		

Shipping Information

Ship To:	Bill To:
	98th St Rivers
	New York, NY 8745

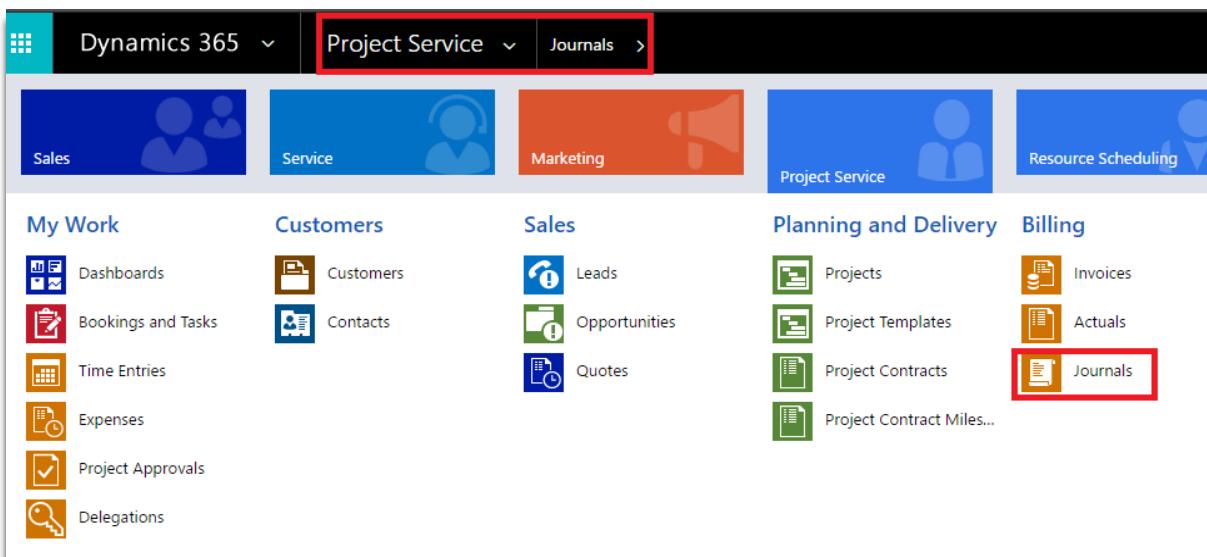
Details

Product ID	Product	Quantity	Price	Sub Total
	CRM Software Consultancy	1.00	\$200.00	\$200.00
	Expenses	1.00	\$0.00	\$0.00
			Total Tax	\$0.00
			Total	\$200.00

Journals

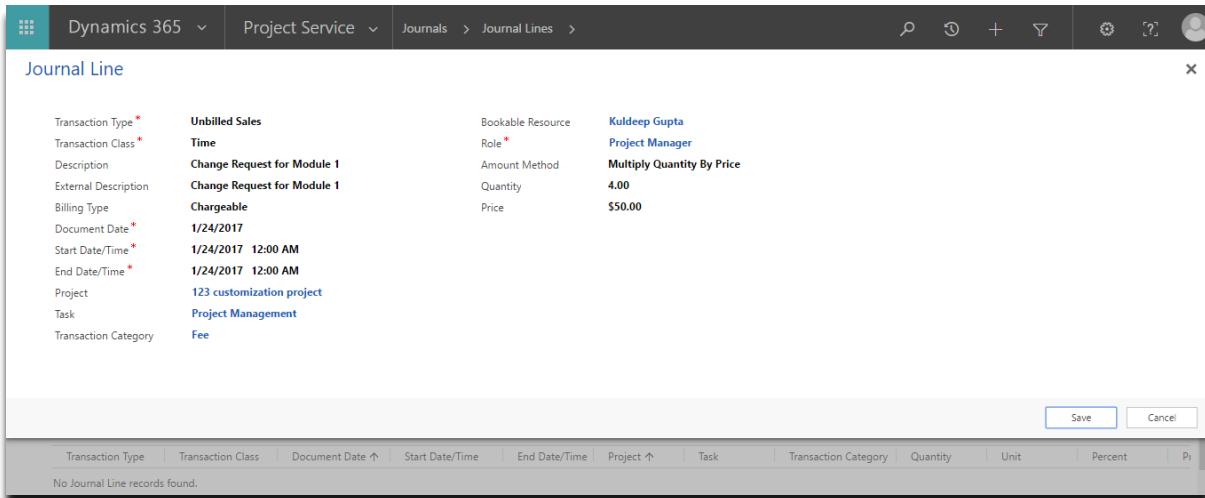
Journal entries in PSA are over and above Contract lines that we need to bill to the client.

For doing the Journal Entry we need to navigate to Project Service → Journals



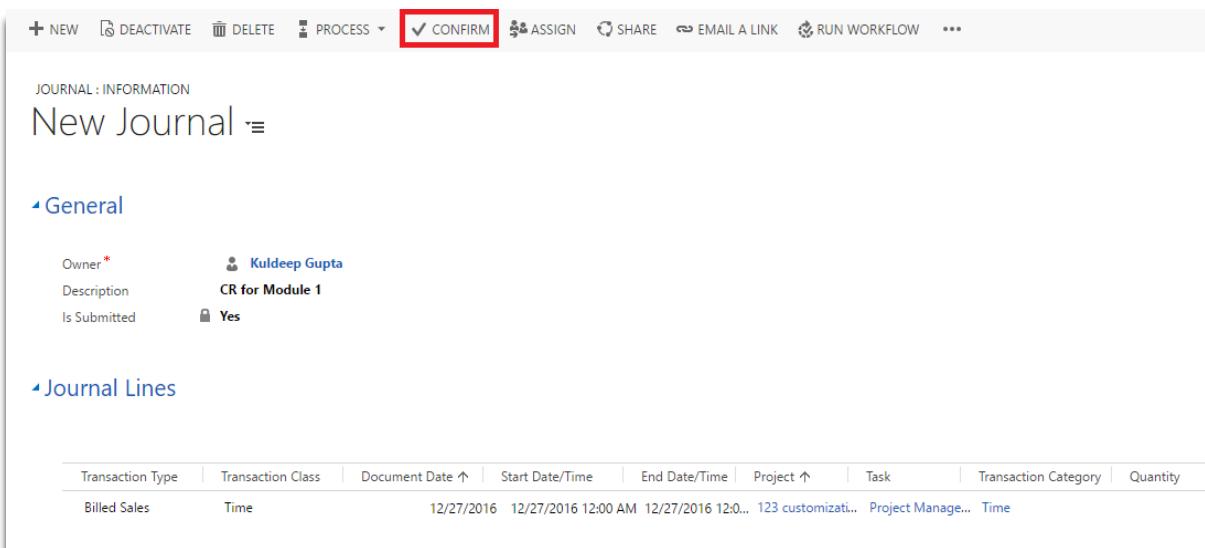
The screenshot shows the Dynamics 365 Project Service interface. The top navigation bar has 'Dynamics 365' and 'Project Service' selected, with 'Journals' highlighted. Below the navigation is a row of icons for Sales, Service, Marketing, Project Service, and Resource Scheduling. The main area is divided into five sections: 'My Work' (Dashboards, Bookings and Tasks, Time Entries, Expenses, Project Approvals, Delegations), 'Customers' (Customers, Contacts), 'Sales' (Leads, Opportunities, Quotes), 'Planning and Delivery' (Projects, Project Templates, Project Contracts), and 'Billing' (Invoices, Actuals, Journals). The 'Journals' icon in the 'Billing' section is highlighted with a red box.

Click on “New” Button from the Ribbon control to create a new Journal Entry. Fill in all the details on the quick create form.



Transaction Type *	Unbilled Sales	Bookable Resource	Kuldeep Gupta
Transaction Class *	Time	Role *	Project Manager
Description	Change Request for Module 1	Amount Method	Multiply Quantity By Price
External Description	Change Request for Module 1	Quantity	4.00
Billing Type	Chargeable	Price	\$50.00
Document Date *	1/24/2017	Start Date/Time *	1/24/2017 12:00 AM
Start Date/Time *	1/24/2017 12:00 AM	End Date/Time *	1/24/2017 12:00 AM
Project	123 customization project	Task	
Task	Project Management	Transaction Category	Fee
Transaction Category		Quantity	
Unit		Percent	
<input type="button" value="Save"/> <input type="button" value="Cancel"/>			

After the details are saved, you need to Confirm the same by pressing the “CONFIRM” button from Ribbon control.



Transaction Type	Transaction Class	Document Date	Start Date/Time	End Date/Time	Project	Task	Transaction Category	Quantity
Billed Sales	Time	12/27/2016	12/27/2016 12:00 AM	12/27/2016 12:00...	123 customization...	Project Manage...	Time	

The confirmed Journal entry now appears in the Actual Associated View in Project Contracts. You can then choose to invoice the same to the client.

About the Author-

Kuldeep Gupta is a Sr. Project Manager at CloudFronts. Kuldeep's deep Project Management skills and focus on Project Methodology and processes have been the cornerstone of many successful project deliveries.

Kuldeep is also a Product Manager for our flagship Project Management Application for Dynamics 365 (PM App). The PM App, which is now listed on the [AppSource](#), started as an internal project to manage the entire Project Life Cycle within Dynamics. Yes, we do eat our own dog food.

This 4-part series on the Dynamics 365 PSA App is an initiative by Kuldeep and is meant for any Project Manager who wants to get up and running on Dynamics 365 PSA. It improves on the existing Dynamics documentation from Microsoft, through screen captures and additional content that Kuldeep found missing when setting up D365 PSA.

We are excited to have Kuldeep on board and lead our Project Management activities. Kuldeep is available for any discussion on Project Management and can be reached at kgupta@cloudfronts.com or you can tweet him at [#askcloudfrontsPM](#).

Project Management Best Practices Consulting & Setup-

For any Professional Services organization, successful project delivery is at the heart of the business. We don't make pens, chairs or phones, we deliver services based projects. Efficient Project Management requires good tools and best practices that are honed over time.

Our Project Managers have delivered Projects of various sizes, from 2 week QuickStarts to 6 month projects that span various industry verticals. Engage us for Project Management best practices consulting and setup of your PM App or PSA solution."

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