How is the Technical Brief used for?

Understand most common challenges companies face implementing Customer Engagement Solutions

The Technical Brief provides answers to key Technical Decision Maker questions and/or concerns in topics such as:
- Extensibility
- Security
- Deployment and Management
- Integration
- Application Architecture
- Collaboration
- Mobility

Deliver memorable conversations to Technical Decision Makers highlighting Dynamics CRM Capabilities

Turn your conversations into memorable conversations by learning how to showcase Dynamics CRM Online value proposition to Technical Decision Makers.
Challenges

Companies face implementing Customer Engagement Solutions

- Deployment and Management
- Quick Extensibility
- Access Anywhere
- Insight
- Security
- Collaboration
- Integration
How do we solve these challenges?
Quick Extensibility
Quick Extensibility

1. Marketplace Templates
   get up and running quickly

2. Click and Configure
   build your Customer Experience

3. Extensible Architecture
   n-tier architecture

4. Developer Tools
   Development Center
Dynamics CRM + Marketplace Industry Templates

Market Smarter
Plan and deliver engaging campaigns with quantifiable results end to end

Sell Effectively
Focus on what matters to close more deals faster.

Care Everywhere
Earn customers for life with responsive, relevant, effective service

INDUSTRY TEMPLATES
Expedite, Configure, and Extend amazing customer experiences for your unique business strategy with marketplace Industry Templates

Extend and Configure for any Vertical Market

Mobile
Social
Insights
xRM Platform
Extensible Architecture

Customers, Employees, Partners

Devices

Native UI  Custom UI  Reporting / Insight  Integrated Apps

Services

Security

Business Logic

Business Entities, Business Rules, Custom Entities, Pre/Post Event Handlers (Plug-ins)

Processes

Metadata

Data
Developer Tools

- CRM Developer Center
- Dynamics CRM SDK
- Build managed code using Visual Studio and the .NET Framework
- Code generation tool for early bound entity classes
- Entity Metadata Browser
- Enhanced debugging experience with Microsoft Visual Studio
- Solution Packager Tool for team development
- Custom Code Validation Tool

CRM Developer Center


What is Microsoft Dynamics CRM 2015 and Microsoft Dynamics CRM Online?

Microsoft Dynamics CRM 2015 and Microsoft Dynamics CRM Online provide a powerful business application platform that delivers to customers, Microsoft Partners, and Independent Software Vendors (ISVs) an opportunity to extend and provide value added solutions. These solutions build on top of the robust core platform capabilities included with Microsoft Dynamics CRM. By using these capabilities, you can build customized solutions without having to custom build the foundation.
Integration
Integration

1. Presentation Layer
2. Business Layer
3. Data Layer
Presentation Layer

**Out of the Box**
- Form Designer
- Business Insight Views with *InsideView*
- Social Analysis Views with *Microsoft Social Engagement*
- Integrated Marketing Campaign Portal with *Microsoft Dynamics Marketing*

**Optional**
- Embed content from another location using IFRAMEs

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**Client Side Programming**
- Client Side SDK
- JavaScript Libraries
- Client Side Context
- Form Events

**Mash-ups**
- Web Resources - i.e., HTML, JavaScript, Images
Business Layer

Create, Evaluate, Aggregate, Integrate, Automate and Extend your Business Rules

Workflow
Workflow Modules
Custom Workflow Activities

Extend Business Logic
Custom Business Logic
Server Side Code / SDK
Plug-ins & Event pipeline
Server extensions – early and late bound
Azure Logic Apps
OData REST / SOAP API – ATOM/JSON Support

Integration Components / Modules
3rd Party Data Connectors
Parature Integration
Dynamics Marketing Integration with Microsoft Connector
Azure Integration

Business Rules Designer
UI and Server Side Business Rules
Business Process Flows
Workflow Designer
Metadata driven architecture makes upgrades and customizations easier!

Metadata
- Metadata Driven Architecture
- Entity Metadata Browser

Data Access
- LINQ
- Fetch XML
- QueryExpression

Data Integration
- Alternate Keys
- Change Tracking
- Upsert
- Optimistic Concurrency

Data Protection
- Role-Based
- Record-Based
- Field-Level
- Data Encryption in transit and at rest

Data Management
- Business Data Auditing
- Duplicate Data Detection
- Bulk Data Functions
- Data Import/Export
Collaboration
Collaboration

1. **Productivity**
   native integration with Office 365

2. **Contextual Conversations**
   collaborate, discuss topics and capture feedback in real-time

3. **Communication**
   instant message, online status, presence, voice and video calls
Productivity

**Document Management**
- Server-based Integration in O365
- Native document grid display
- Document management (check-in, upload, open)
- Search of files in record

**Office 365 Groups**
- Contextual Record Level
  - Calendaring
  - Teams
  - Documents

**Office Apps**
- Immersive Excel Experience
- Sharing notes with OneNote
- Outlook
  - Server Sync
  - Email Folder Tracking
  - CRM for Outlook App

**DYNAMICS CRM**
Communication & Conversations

- Contextual Record Level Conversations with Office 365 Groups
- Post, Like, Reply, View Conversations
- Ask Questions
- Community
- Social Collaboration
- Click to Call from Web, Mobile, and Tablet Client
- IM presence option
- CTI adapter model *(Unified Service Desk)*
  - Screen Pop & Call Automation
- Contextual Record Level Conversations with Office 365 Groups
Security
Security

1. **Security Principals**
   - define users and teams

2. **Access Control Components**
   - define roles, sharing rules, business units, organization wide access

3. **Field level Security**
   - secure sensitive data
Security

**Security Principals**
- **System User**
- **Owner Teams**
- **Access Teams**

**Access Control Components**
- **Sharing Rule**
  - Used for defining explicit privilege to a record for a security principal.
- **Organization**
  - Indicates security principal’s access to any record across the organization (access to specific type of data across entire system).
- **Business Unit**
  - Hierarchical scoping mechanism defining access for a defined group.
- **Security Role**
  - Collection of privileges applied to a group scoped by ownership, business unit or organization. Assigned to users or owner teams.
- **Privilege**
  - Specific type of data access granted to a security principal.

**Privileges**
- **Create**
- **Append**
- **Write**
- **Assign**
- **Read**
- **Append To**
- **Share**
- **Delete**

- ✓ Field level security for sensitive data
- ✓ Hybrid Authentication for On Premises and Online
- ✓ WS, SAML, OAuth
- ✓ Support for Multi-Factor Authentication in Online
- ✓ Native integration with **Active Directory**
- ✓ Position and Manager based Hierarchy Security Models
Access Anywhere
Access Anywhere

1. Mobile Productivity
2. Configure Once, Deploy Anywhere
3. Mobile SDK
4. Enterprise Ready

Full Reference: Dynamics CRM Mobility
Access Anywhere

Mobile Productivity
- Right data at the right time on the right device
- Outcome driven user experience

Configure Once, Deploy Anywhere
- Consistent configuration experience
- Tailored app for tablets and phones

Mobile SDK
- APIs for custom development
- Templates for various mobile platforms with Azure

Enterprise Ready
- Mobile App Management (MAM) Compatible
- Consistent security roles & privileges
Insight

1. Data
   multiple data source support

2. Tools
   business user-centric designers

3. Insight
   collaborate, discover, share
Insight

- Self-Service BI
- Operational & Ad-Hoc Reporting
- Collaboration & Sharing
- Sentiment Analysis

DATA

- DYNAMICS CRM DATA
- RELATIONAL, NON-RELATIONAL, ANALYTICAL DATA
  - Custom OData Feed
  - Azure Data Market
  - Social Data
  - ERP Data Sources
  - Public, Private Cloud Data
  - Big Data

TOOLS

- DYNAMICS CRM
  - View Editor
  - Dashboard Designer
  - Report Builder
  - Charts
  - 3rd Party Solutions

- POWER BI
  - Power Query
  - Power Pivot
  - Power View
  - Power Map
  - Power BI Sites

- MICROSOFT SOCIAL ENGAGEMENT
  - Sentiment Analysis
Deployment & Management
Deployment & Management

1. Modern, High Performing Infrastructure
   Multi-Geo Datacenters

2. Secure and Compliant
   3rd party testing, regulatory compliance

3. Instance Management
   production and non-production (sandbox)

4. Government Certified Cloud
   U.S. Government

5. Deployment Options
   Online (SaaS); On-Prem (Self-Hosted); Azure IaaS

Full Reference: Dynamics CRM Cloud
Tenant
contains uniquely identified domains, users, security groups, and subscriptions and can contain multiple CRM Online instances. The tenant created for you has a domain name of <account>.onmicrosoft.com. For example, contoso.onmicrosoft.com.

Instance
creates a separate and isolated Microsoft Dynamics CRM organization on the same tenant. An instance has the URL format: https://<URL name>.crm.dynamics.com. For example, https://contososales.crm.dynamics.com.

Instance Types
production & non-production (sandbox)

Instance Management
add | copy | delete | switch | reset | edit | snapshot | admin mode

Sandbox
use sandbox instances for dev; test; UAT; training; other