Building Dashboards

> **Series:** ONBRD | **Notebook:** 10 of 10 | **Created:** December 2025

Visualizing Your Data

Dashboards provide at-a-glance visibility into your environment's health and performance. This notebook covers dashboard creation, common visualization patterns, and sharing with your team.

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Prerequisites

- Viewer access or higher
- Familiarity with DQL (ONBRD-08)
- Data in your environment to visualize

1. Dashboards vs Notebooks

Dynatrace offers two visualization tools:

Feature	Dashboard	Notebook
Purpose	Monitoring at a glance	Interactive analysis
Layout	Fixed grid tiles	Sequential document
Auto-refresh	Yes	Manual
Interactivity	Click-through links	Query editing
Sharing	Wall displays, reports	Investigation documentation
Best for	NOC screens, status pages	Troubleshooting, exploration

When to Use Each

Scenario	Use

Team status display	Dashboard
Incident investigation	Notebook
Executive summary	Dashboard
Root cause analysis	Notebook
SLA reporting	Dashboard
Ad-hoc queries	Notebook

2. Creating Your First Dashboard

Location: Observe and explore → Dashboards → Create dashboard

Dashboard Creation Steps

1. Click "Create dashboard"
2. Name your dashboard (e.g., "Production Overview")
3. Add tiles by clicking "+" or dragging
4. Configure each tile
5. Arrange and resize as needed
6. Save

Dashboard Settings

Setting	Description
Name	Dashboard title
Time frame	Default time range
Segment	Default filter scope
Refresh rate	Auto-refresh interval
Owner	Dashboard owner
Sharing	Who can view/edit

3. Common Tile Types

Data Tiles

Tile Type	Use Case
Single value	Key metrics (uptime, error count)
Graph	Time series data
Table	Lists and details
Top list	Ranked entities
Pie chart	Distribution
Honeycomb	Entity health grid

Content Tiles

Tile Type	Use Case

Markdown	Documentation, links
Problems	Active problem list
Host health	Infrastructure status
Service health	Service status
SLO	Service level objectives

Visualization Types

![Visualization Guide]
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4. Dashboard Patterns

![Dashboard Patterns]

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8L3N2Zz4K)

Pattern: Executive Summary

Key elements:
- **KPI row**: Uptime, Errors, Avg Response, Active Problems
- **Trend chart**: Response time over 24h
- **Problem list**: Current issues
- **Service health**: Status indicators for key services

Pattern: Service Dashboard

Key elements:
- **KPI row**: Requests, Error Rate, P95 Response, Apdex
- **Timeline**: Request rate and errors over time
- **Top endpoints**: Most called API endpoints
- **Dependencies**: Downstream service health

Pattern: Infrastructure Dashboard

Key elements:
- **KPI row**: Host count, Avg CPU, Avg Memory, Disk Alerts
- **Honeycomb views**: Visual host health for CPU and memory
- **Top consumers**: Hosts using most resources

5. Useful Queries for Dashboards

These queries work well as dashboard tiles.

Service Health Queries

```dql
// Total request count (Single Value tile)
fetch spans, from: now() - 1h
```

```dql
| filter span.kind == "server"
| summarize request_count = count()
```

```dql
// Error rate percentage (Single Value tile)
fetch spans, from: now() - 1h
| filter span.kind == "server"
| summarize
    total = count(),
    errors = countIf(span.status_code == "error")
| fieldsAdd error_rate = round(100.0 * errors / total, decimals: 2)
```

```dql
// Top services by request count (Top List tile)
fetch spans, from: now() - 1h
| filter span.kind == "server"
| summarize requests = count(), by: {service.name}
| sort requests desc
| limit 10
```

```dql
// Service error rates (Table tile)
fetch spans, from: now() - 1h
| filter span.kind == "server"
| summarize
    requests = count(),
    errors = countIf(span.status_code == "error"),
    by: {service.name}
| fieldsAdd error_rate = round(100.0 * errors / requests, decimals: 2)
| sort error_rate desc
| limit 15
```

Infrastructure Queries

```dql
// Host count (Single Value tile)
fetch dt.entity.host
| filter state == "RUNNING"
| summarize host_count = count()
```

```dql
// Hosts by OS type (Pie Chart tile)
fetch dt.entity.host
```

```dql
| summarize count = count(), by: {osType}
| sort count desc
```

```dql
// Host inventory (Table tile)
fetch dt.entity.host
| fields name = entity.name, os = osType, state, cpuCores
| sort name
| limit 25
```

Log Queries

```dql
// Error log count (Single Value tile)
fetch logs, from: now() — 1h
| filter loglevel == "error"
| summarize error_count = count()
```

```dql
// Log volume by severity (Pie Chart tile)
fetch logs, from: now() — 1h
| summarize count = count(), by: {loglevel}
| sort count desc
```

```dql
// Recent errors (Table tile)
fetch logs, from: now() — 1h
| filter loglevel == "error"
| fields timestamp, log.source, content
| sort timestamp desc
| limit 10
```

Problem Queries

```dql
// Active problem count (Single Value tile)
fetch dt.davis.problems, from: now() — 30d
| filter status == "OPEN"
| summarize active_problems = count()
```

```dql
// Problems by status (Pie Chart tile)
```

```dql
fetch dt.davis.problems, from: now() — 7d
| summarize count = count(), by: {status}
```


```dql
// Recent problem list (Table tile)
fetch dt.davis.problems, from: now() — 24h
| fields timestamp, display_id, title, status
| sort timestamp desc
| limit 10
```


6. Sharing and Permissions

Sharing Options

Sharing Level	Who Can Access
Private	Only you
Shared with specific users	Named users
Shared with groups	User groups
Public	Anyone with environment access

Segment Filtering

Dashboards can be filtered using segments:
- Set a default segment in dashboard settings
- Viewers can switch segments if they have access
- Data respects viewer's permissions

Dashboard Presets

Create presets for common views:
1. Set segment filter
2. Set time range
3. Save as preset with descriptive name

Exporting Dashboards

Format	Use Case
PDF	Reporting, documentation
JSON	Backup, migration
Link	Sharing (respects permissions)

7. Next Steps

Congratulations! You've completed the onboarding series.

What You've Learned

Notebook	Key Topics
ONBRD-01	Tenant access, navigation
ONBRD-02	IAM, SAML, permissions
ONBRD-03	ActiveGate deployment
ONBRD-04	Cloud & SaaS integrations
ONBRD-05	OneAgent deployment
ONBRD-06	Tags, segments, naming conventions
ONBRD-07	Data model, topology
ONBRD-08	DQL fundamentals
ONBRD-09	Workflows alerting
ONBRD-10	Dashboard creation

Where to Go Next

Goal	Resources
Deepen DQL skills	SPANS series, OPLOGS series
Log management	OPMIG series (OpenPipeline migration)
Synthetic monitoring	SYNTH series
Access control migration	MZ2POL series
Platform migration	USFOODS series (NR to Dynatrace)
Official training	Dynatrace University
Community	community.dynatrace.com

Dashboard Checklist

- [ ] First dashboard created
- [ ] Key metrics visualized
- [ ] Problem overview included
- [ ] Dashboard shared with team
- [ ] Segment filter set

Summary

In this notebook, you learned:

- Difference between dashboards and notebooks
- How to create and configure dashboards
- Common tile types and when to use them
- Dashboard patterns for different use cases
- DQL queries that work well in dashboards
- How to share dashboards with your team

References

- [Dashboards](https://docs.dynatrace.com/docs/observe-and-explore/dashboards)
- [Notebooks](https://docs.dynatrace.com/docs/observe-and-explore/dashboards-and-notebooks/notebooks)
- [DQL Examples](https://docs.dynatrace.com/docs/platform/grail/dynatrace-query-language/dql-examples)
- [Dashboard Sharing](https://docs.dynatrace.com/docs/observe-and-explore/dashboards/dashboard-sharing)
- [Dynatrace Community](https://community.dynatrace.com/)