

Writing & Using Routing Rules

Aeon User Group Meeting
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Housekeeping

- All attendees are muted on entry, please stay muted
- Ask questions in Q&A box
- Use the chat for comment/discussion
- Recording will be available in Atlas VTL in 24-48 hours

Captcha Reminder

- If you use Aeon default login (non-SSO), please consider [adding Captcha](#) to NewUserRegistration to prevent bot accounts
- Search using custom search or AtlasBI User Analytics report to find bot accounts
 - Submit support ticket to remove
- See additional guidance in the [Community Forum](#) (or listserv archive)

Agenda

- Routing Rule Basics
- Routing Table
- How Does It Work?
- Writing Routing Rules
- Troubleshooting
- Q&A

Routing Rule Basics

- Routing Rules modify transaction statuses set by default workflow
- Can skip or add steps automatically
- Triggered when some action prompts an item to move from one queue to another
- Always applied in a set order
- Should be “exclusive” from one another

Routing Rule Basics

- Routing is configured in Customization Manager
- Queues used for routing need to exist first before rule is configured
- Processed in numeric order set in Routing table
- Routing rules become effective immediately when turned on
- Several routing rules are [present by default](#) in the Routing table for new Aeon installations beginning with Aeon 5.2

Routing Rule Basics

Initiating Routing

- The routing process is automatically triggered each time a transaction's status is updated.
- Begins with a filter based on TransactionStatus
 - Only rules that match will be used in automated search process
- Initial search created using the MatchString of the first (ordered by RuleNo) rule
- Rules do not "stack" (i.e. one route per status change)

Routing Table Columns

| | |
|---------------------|---|
| Status | Select the transaction status/queue to which the rule will apply from the dropdown menu. Once configured, the routing rule will only apply to requests that enter the status selected in this setting. This value may be any legitimate Aeon status, including any existing custom queues. |
| Match String | Enter the query string specifying the conditions that must be matched by a request before the rule will be applied. |
| New Status | Enter the new transaction status/queue to which the request will be routed. This value may be any legitimate Aeon status, including any existing custom queues. |
| Description | Enter text that describes what the rule is intended to do. |

NOTE

The queue type (*Transaction* or *Photoduplication*) is displayed for each status/queue in the **Status** dropdown menu. Once a status is selected, the values that appear in the **New Status** dropdown will be limited to the statuses within that queue type.

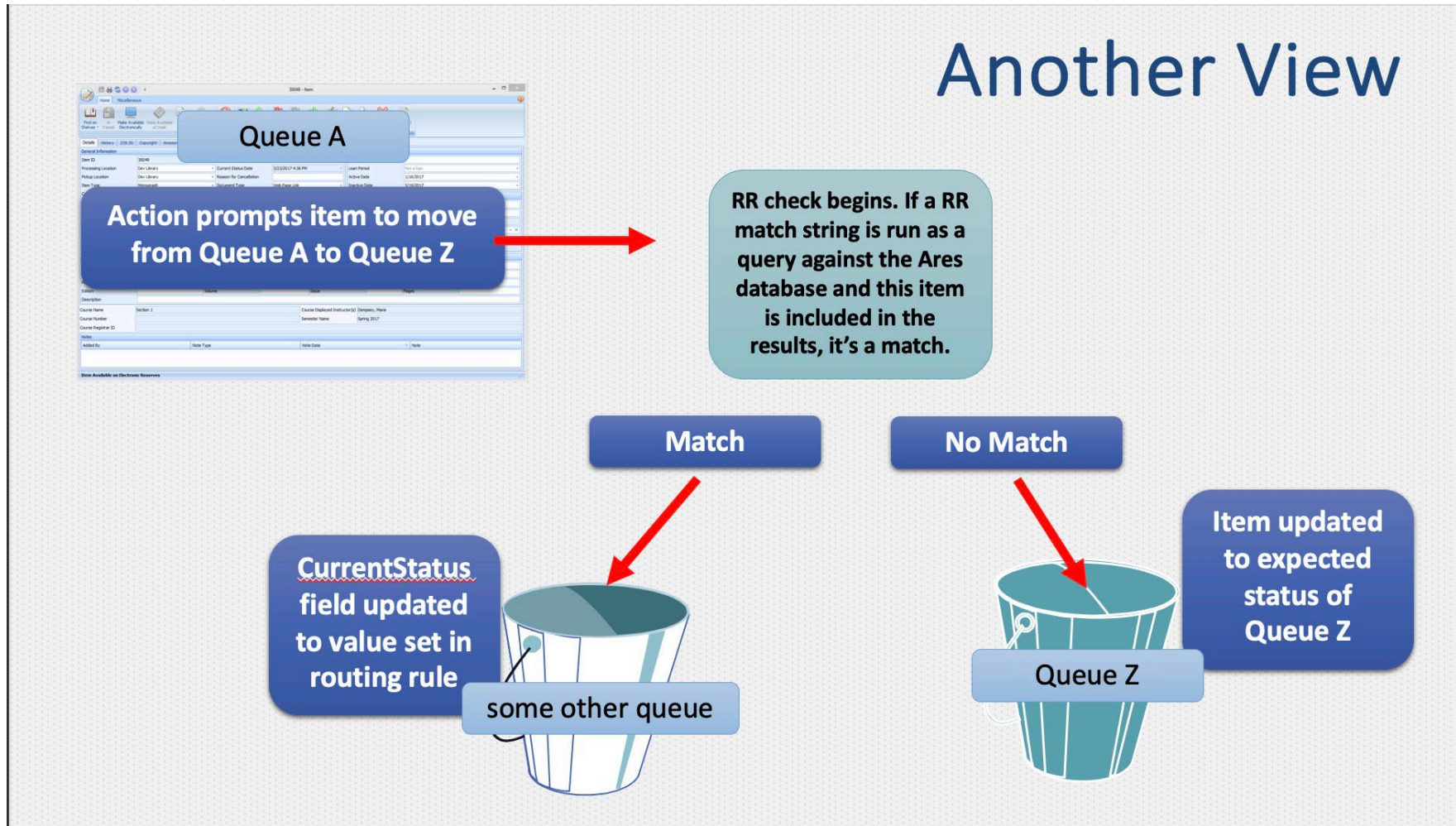
How Does It Work?

Every status change triggers a database query

- Item compared to “match string” filter in routing rules
 - MatchString = **YES**
 - Request updated to new status
 - MatchString = **NO**
 - Searches next rule until a match occurs (i.e. MatchString = YES) OR until there are no more routing rules to check
 - Item moves to typical status expected from action

How Does It Work?

Another View



Writing Routing Rules

MatchString Basics

- Set prefixes for tables
 - T = Transactions (ex: t.ItemNumber)
 - U = Users (ex: u.Status)

Copy & Paste **WARNING!**
Curly quote: '
Straight quote: '

TIP: Keyboard shortcuts for straight quotes: type single quote, then CTRL + Z (or Command + Z on mac keyboard)

Writing Routing Rules

Operators

Single quotes should be used around alpha character criteria

t.DocumentType = 'Manuscript'

AND can combine statements and terms

u.Status = 'Staff' AND u.Cleared = 'Yes'

LIKE with a '%' is a wildcard

t.Location LIKE '%Off%' matches Offsite and Off-site

OR should include parenthesis

(u.Status = 'Faculty' OR u.Department = 'Library')

IN can be used to define OR questions in a single field

u.Department IN ('Biology', 'Chemistry')

Can use its inverse to return neither

c.Department NOT IN ('Mathematics', 'Accounting')

Writing Routing Rules

Other Common Syntaxes

NULL

t.CallNumber IS NULL

Blanks

t.CallNumber = ''

Blank or NULL

ISNULL(t.CallNumber, '') = ''

Blanks or values, but not NULL

t.CallNumber IS NOT NULL

Not blank and not NULL

ISNULL(t.CallNumber, '') != ''

Does not equal

t.CallNumber <> 1

t.CallNumber != '1'

Greater, less, equal to

> = , < = , =

Writing Routing Rules

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Writing Routing Rules

How To Begin?

What is the problem? What is your goal?

Route restricted materials
to dedicated queue

Need to know which items
need to be requested
from offsite

Items requested for
specific location need to
route to specific queue

Move reproduction orders
to specific status for
processing

Flag requests for items
already in active queues

Create activity-specific
routes

Writing Routing Rules

Example

Route restricted materials to dedicated queue

| Field Name | Entry |
|-------------------|---|
| RuleNo | (auto-assigned*) |
| RuleActive | Yes |
| TransactionStatus | Awaiting Request Processing |
| MatchString | t.AccessRestrictions <> 'Not Restricted' |
| New Status | Restricted Request |
| Description | Moves new requests with restrictions to specific Restricted Request queue |

*Changes based on position in routing list

Writing Routing Rules

Example

Flag requests for items already in active queues

| Field Name | Entry |
|-------------------|--|
| RuleNo | (auto-assigned*) |
| RuleActive | Yes |
| TransactionStatus | Awaiting Request Processing |
| MatchString | (t.CallNumber IN (Select CallNumber from Transactions where TransactionNumber != t.TransactionNumber and TransactionStatus NOT IN ('5','26','28','30','32'))) and (t.TransactionNumber not in (SELECT TransactionNumber from TransactionFlags where FlagID = 1)) |
| New Status | New Reading Room Request |
| Description | Moves new requests made by patrons currently signed into the reading room (route by call number) |

*Changes based on position in routing list

Writing Routing Rules

Further Examples

Route based on user's status:

```
u.Status = 'SpecColl Staff'
```

Route new requests for signed in users:

```
(rrh.TimeOut is NULL and rrh.TimeIn is not NULL) AND (Away = 0)
```

Can also add date parameter like `(ISNULL(ScheduledDate,"") = "" OR ScheduledDate <= getdate())`

Route based on form:

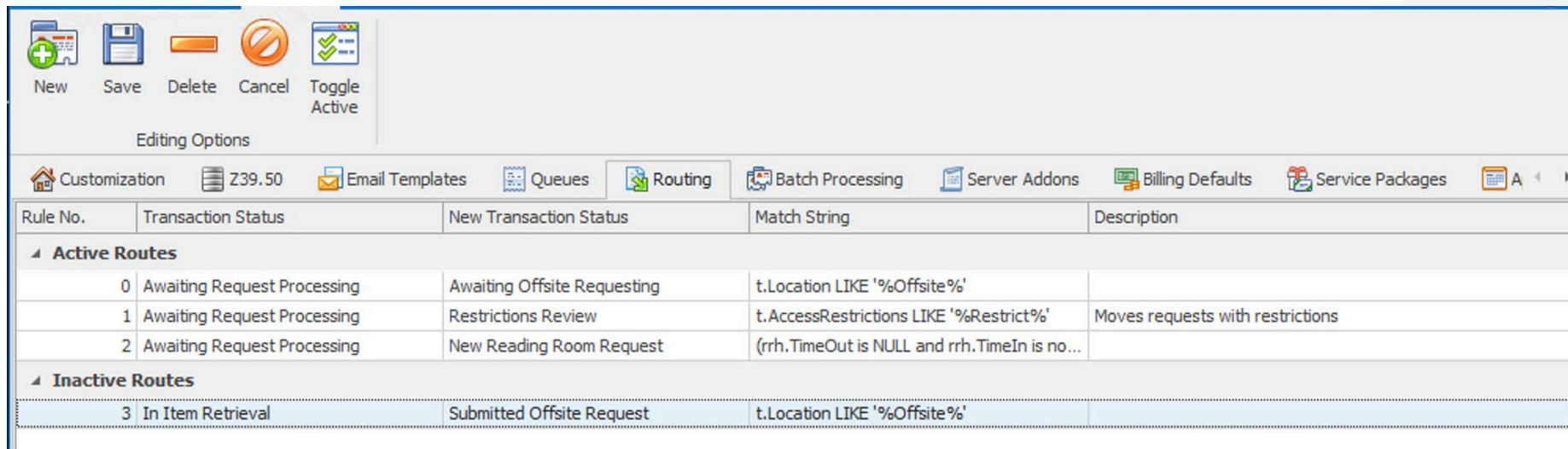
```
t.WebRequestForm = 'GenericRequestMonograph'
```

Alternately, use `DocumentType`

*Changes based on position in routing list

Inactivating Rules

- Rules become active as soon as they are saved
- Rules are processed in the order they display
- Highlight rule to inactivate and click “Toggle Active” button



The screenshot shows a software interface with a toolbar at the top containing icons for New, Save, Delete, Cancel, and Toggle Active. Below the toolbar is a navigation bar with tabs for Customization, Z39.50, Email Templates, Queues, Routing, Batch Processing, Server Addons, Billing Defaults, and Service Packages. The main area displays a table with columns for Rule No., Transaction Status, New Transaction Status, Match String, and Description. The table is divided into two sections: Active Routes and Inactive Routes.

| Rule No. | Transaction Status | New Transaction Status | Match String | Description |
|------------------------|-----------------------------|-----------------------------|--|----------------------------------|
| Active Routes | | | | |
| 0 | Awaiting Request Processing | Awaiting Offsite Requesting | t.Location LIKE '%Offsite%' | |
| 1 | Awaiting Request Processing | Restrictions Review | t.AccessRestrictions LIKE '%Restrict%' | Moves requests with restrictions |
| 2 | Awaiting Request Processing | New Reading Room Request | (rrh.TimeOut is NULL and rrh.TimeIn is no... | |
| Inactive Routes | | | | |
| 3 | In Item Retrieval | Submitted Offsite Request | t.Location LIKE '%Offsite%' | |

Troubleshooting

- Test, test and test again
 - Check your match string using Custom Search
- Watch out for Ordering issues
- Aim for mutually exclusive rules
- Daisy Chains won't work
- Verify work in Tracking table
- Look for typos, capitalization, and hidden spaces
- Prevent Circular routing
 - Trying to manually change status of item back to where it started from (routing rule will kick in again)

Questions?

There's more to dig into!

If you'd like a more in depth (paid) workshop option, please email kgillespie@atlas-sys.com

Thank you!

Contact kgillespie@atlas-sys.com with any questions or concerns

Do you have an interesting workflow, process, or other customization to share?

Please contact kgillespie@atlas-sys.com to share your idea or present at an upcoming user group meeting