



IBM Software Group

# IBM Tivoli Training

## IBM Tivoli Monitoring 6.1

***Synchronizing IBM Tivoli Monitoring 6.1 and Tivoli Enterprise Console***



@business on demand.

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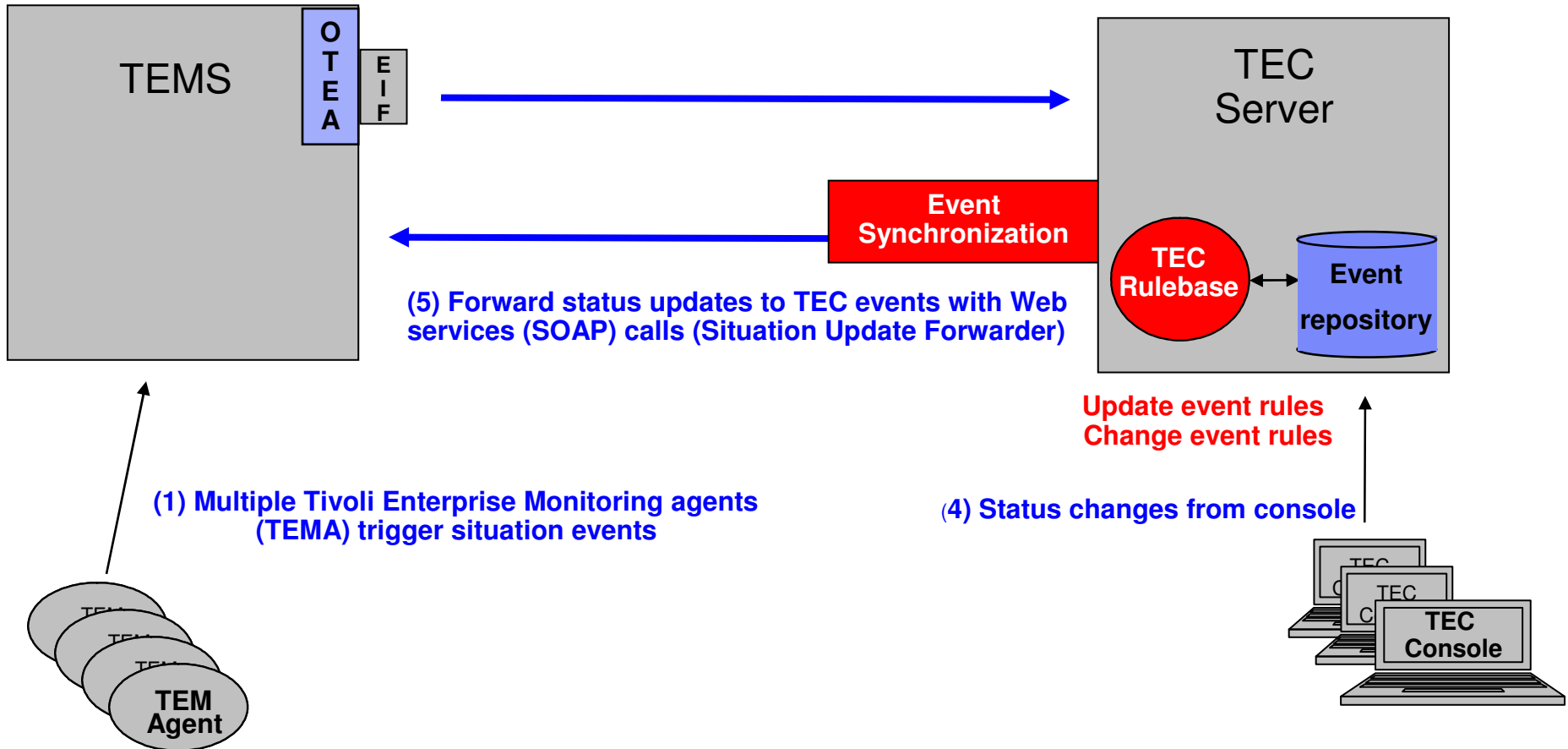
## Objectives

- Upon completion of this module, you will be able to:
  - ▶ Describe event synchronization with Tivoli Enterprise Console.
  - ▶ Install support for Tivoli Enterprise Console integration.
  - ▶ Configure IBM Tivoli Monitoring 6.1 for event synchronization.



# Architecture and Event Flow

- (2) Forward native ITM 6.1 situation events to TEC
- (3) Forward updates on native ITM 6.1 situation events to TEC



# Installation Overview

TEC Integration consists of two parts:

## 1. TEMS Server:

- ▶ TEMS portion already part of the product ITM 6.1
  - OMEGAMON TEC Event Adapter (OTEA)
- ▶ Must be configured

## 2. TEC Server:

- ▶ TEC portion (ITM and TEC Event Synchronization) installed separately on each target TEC
- ▶ New baroc and rule files
  - **omegamon.rls** (synchronization specific rules between ITM 6.1 and TEC)
  - **omegamon.baroc** (new ITM 6.1 events)
  - **sentry.baroc** (updated version to assure DM migration)
- ▶ Configuration



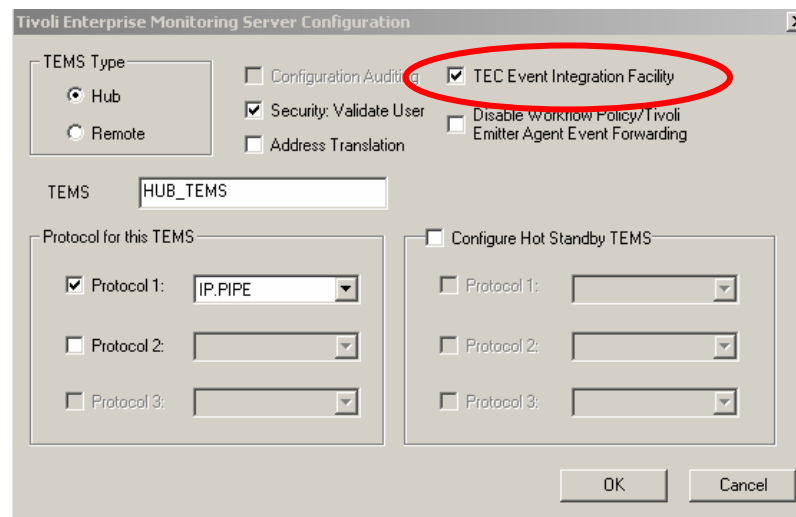
## Installation—ITM and TEC Event Synchronization

- ITM and TEC Event Synchronization: platform dependent
  - ▶ Windows: **TEC\setupwin32.exe** (InstallShield)
  - ▶ UNIX: **setup<os>.bin** (where *os* is **AIX** or **Sun**), **winstall** or Tivoli Desktop
- Installation needs information about
  - ▶ TEMS servers and SOAP URL including TEMS user ID and password
    - Multiple TEMS servers specified
  - ▶ Sleep interval and transfer rate
- TEC rule base to be updated with the new baroc and rules files
  - ▶ Update of current **rulebase**
  - ▶ Creation of a new **rulebase** with or without copy
- SituationUpdateForwarder (SUF): Web services based tool will be installed
  - ▶ Triggered by rules
  - ▶ Logs: **\$DBDIR/logs/synch/synch\_trace.log** and **synch\_msg.log**
- TEC server stopped and restarted during installation



## Configuration—Forwarding Events from ITM 6.1 to TEC: OMEGAMON TEC Event Adapter (OTEA)

- OTEA enabled with **Manage Tivoli Enterprise Services** and **Reconfigure** context menu option of the TEMS



- TEC server and port to be specified (only non-TME based transport mechanism)
- Forward policy based on **all or nothing**
- Filtering only using known EIF filter statements

## Configuration—Forwarding Events from ITM 6.1 to TEC: OTEA, continued

- The location of the EIF adapter files is:
  - ▶ On Windows: **<itm\_installdir>\tems\TECLIB**
  - ▶ On UNIX:  
**<itm\_installdir>/tables/<ms-name>/TECLIB**
- The default EIF files are:
  - ▶ **om\_tec.config**—EIF configuration file
  - ▶ **tecserver.txt**—TEC server mapping file (for non-default event severity mapping)
- For configuration file changes there are also context menus for the TEMS server in **Manage Tivoli Enterprise Services**.
  - ▶ **Advanced** option opens the default system editor
- After changes the TEMS server must be restarted.

```
ServerLocation=my_tec_host
ServerPort=5529
NO_UTF8_CONVERSION=YES
ConnectionMode=connection_oriented
BufferEvents=YES
BufEvtMaxSize=4096
BufEvtPath=./TECLIB/om_tec.cache
FilterMode=OUT
Filter:Class=ITM_Generic ;
```

## Configuration—Forwarding Events from ITM 6.1 to TEC: Situation-to-TEC mapping

- Standard ITM 6.1 situations are mapped to event class **ITM\_Generic**.
- DM migrated situations are mapped to the former **Sentry2\_0\_Base** event class.
- Default severity mapping:

ITM 6.1 Severity	Informational	Warning	Critical
TEC severity	Harmless	Warning	Critical

- Other TEC severities can be specified by means of the TEC server mapping file.
- Clearing events for ITM 6.1 sampled situation events are always sent with severity **WARNING**.

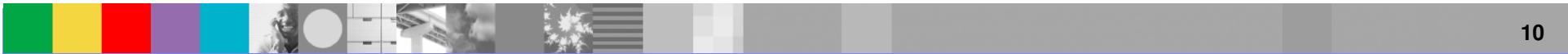


## Configuration—Forwarding Events from ITM 6.1 to TEC: TEC Server mapping

- Change default situation-to-event mapping behavior
- Map situations with different severities to different TEC servers
- Assure parity with DM monitors
  - ▶ Allowed multiple (more than 3) response levels with different TEC severities assignments and different TEC targets
- Filename: **tecserver.txt**
- Syntax: `sitname=tecservername[:port]*[,SEVERITY=severitylevel]`
- Examples
  - ▶ **sit1=tecserver2,SEVERITY=CRITICAL**
    - CRITICAL events sent to TEC server **tecserver2** when **sit1** is raised
  - ▶ **sit2=\*,SEVERITY=MINOR**
    - MINOR events sent to default TEC server (\*) when **sit2** is raised
- Supports only default severities defined in **root.baroc**

## SituationUpdateForwarder (SUF)

- Java background process for communication with ITM 6.1 TEMS
- Installation directory for SituationUpdateForwarder (SUF) tool
  - ▶ Windows: %**BINDIR%**\TME\TEC\OM\_TEC
  - ▶ UNIX: **\$BINDIR/TME/TEC/OM\_TEC**
- Default configuration directories of SituationUpdateForwarder tool
  - ▶ Windows: **c:\Program Files\TME\TEC\OM\_TEC\etc**
  - ▶ UNIX: **\$BINDIR/TME/TEC/OM\_TEC**
- Key configuration files
  - ▶ **situpdate.conf**—configuration of event synchronization
  - ▶ **situser.conf**—user ID and password for Web services interactions (encrypted)
- Should not be edited manually
  - ▶ Scripts provided by the SUF tool
- Restart SituationUpdateForwarder program after configuration parameter changed



# SituationUpdateForwarder Configuration Commands

- **sitconfig.sh**

- ▶ Configure event synchronization process
  - Configuration file name (default is **situpdate.conf**)
  - Directory location of event cache files
  - Polling interval for updates (default is 3 seconds)
- ▶ Run command after manual update of configuration
- ▶ TEC server gets latest configuration information
- ▶ Example:

```
sitconfig.sh update fileName=situpdate.conf logLevel=med
```

- **sitconfsvruser.sh**

- ▶ Configure user ID and password for Web services interactions
  - Stored in an encrypted file
- ▶ Example:

```
sitconfsvruser.sh add server=itm17.ibm.com userid=admin  
password=acc3ssing
```



# SituationUpdateForwarder Control Commands

## **start, stop, test ,query**

- Located in: **\$BINDIR/TME/TEC/OM\_TEC/bin**
- **test**—test the connection to the TEMS server and verify the configuration
- **query**—state of the program
- To start and stop the process:
  - ▶ Windows:
    - **startSUF.cmd** or **net start situpdate**
    - **stopSUF.cmd** or **net stop situpdate**
  - ▶ UNIX:
    - **startSUF.sh**
    - **stopSUF.sh**



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