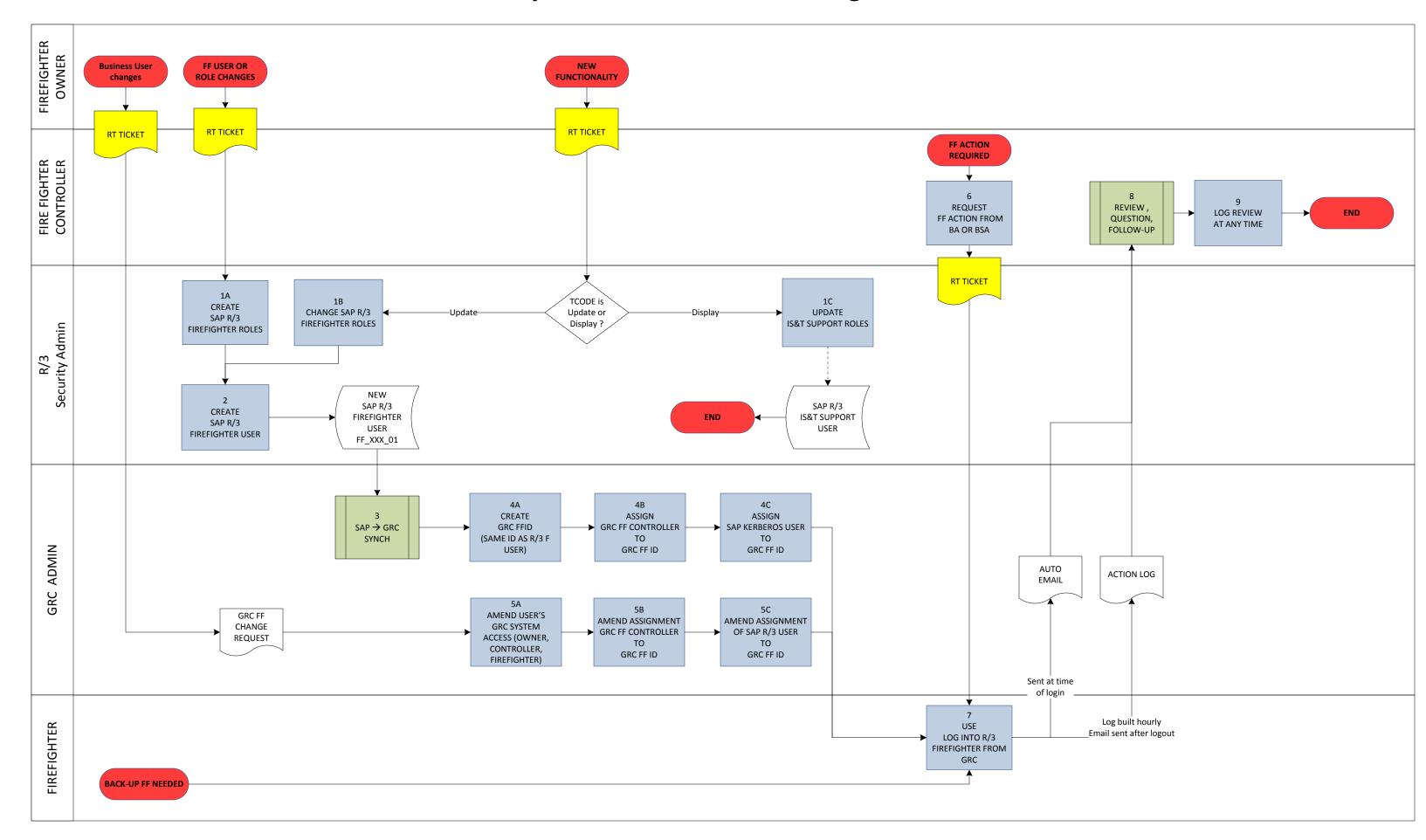
MIT SAP Security & GRC Process: 4. FireFighter Users and Roles





Process 4: FireFighter Users and Roles

This section covers the special circumstances where users and roles are created for emergency "FireFighter" use and for changes to IS&T Support roles. Where the term "FireFighter" is used here, it relates to the use of the GRC-EAM (Emergency Access Management) functions which have some special features which require administration and monitoring.

The features in use at MIT are:

- Special SAP R/3 FireFighter Users and Roles typically with limited update functionality. Access rights to the R/3 FF Users are pre-assigned in GRC-EAM to specific business users who need occasional or emergency access to functions which would otherwise create SOD issues if permanently assigned. Some Firefighter Users have roles with more access than others see the various FFID types described below.
- The firefighter logs into the GRC-EAM system with their SAP Kerberos User ID run the transaction /n GRAC_SPM; they will see the Firefighter launch pad, with the pre-assigned FireFighter user. The firefighter "logs in" to the pre-assigned Firefighter user, which allows them to access SAP R/3 to perform the emergency or back-up business functions. When finished, they log out of their SAP R/3 session, and then log out of SAP GRC.
 - o A FFID can be shared, but can only one person can log into it at a time.
 - o The FireFighter ID Owner determines the appropriate assignment for the Firefighter ID.
 - The FireFighter Controller for that FFID is notified when it is used
 - o The FireFighter User actions are logged and reviewed by FireFighter Controller or Delegate when the Firefighter logs out.
- All SAP Users which are set up for FireFighter usage will be named like "FF_XXX_NN" where XXX = the business area letters (can be a few more characters if needed) and NN is a sequential number. User Type = SERVICE and special role assigned to identify it as a GRC FireFighter (see step 2A). The R/3 @@GRC Repository Synch job synchronizes R/3 user assignment data with production GRC. The GRC Admin creates a FFID in the NWBC (NetWeaver Business Client) interface with the same id as the R/3 User. All Firefighter users must have their own personal SAP IDs manually created in GRC. The different

FFID types have different roles in R/3:

- Business User FFID: has limited update transactions, specific to the business areas or job duties for the users being backed-up. This
 would have SODs when combined with business user's standard role.
- Business Analyst FFID: has update transactions with broad business access roles are either Finance/Logistics or HR/Payroll focused.
 Will always have SODs are they are broad access to deal with any issues. At MIT these are Composite Roles combining all the standard business roles for the business area.



- IS&T BSA FFID and BSA Manager FFID: has update transactions with broad business access roles are either Finance/Logistics or HR/Payroll focused. Will always have SODs are they are broad access to deal with any issues.
- IS&T Basis Admin FFID: has some special access over and above what they already have.
- IS&T Developer FFID and Developer Manager FFID: has update transactions with broad business access to deal with any issues and
 these will always have SODs. The roles are either Finance/Logistics or HR/Payroll focused and some Developer FFIDs and the Developer
 Manager FFID include EDI and Workflow support access,
- Note: Support User in IS&T BSA: has display only transactions with broad business access, so should never have an SOD for these.
- Note: Regular BA users: display only transactions with broad business access, so should never have an SOD for these.

After the initial FireFighter process set-up, the ongoing administration consists of:

More frequently

- Creation of SAP Kerberos ID in GRC for Firefighters
- GRC Assignment of SAP Users to FireFighter Ids (adding and removing assignment)
- SAP R/3 FireFighter Role maintenance new functionality for the business needs to be added, and discontinued functionality removed.

Less frequently

- GRC Assignment / de-assignment of FireFighter Ids to FFID Controllers
- New SAP R/3 FireFighter Users when there are additional FFID Controllers

Some additional MIT-specific background points related to FireFighter design:

- The FireFighter SAP R/3 users do not have Kerberos ids, so they are created by SAP R/3 Security Admin, and no profiles are provisioned through Warehouse or RolesDB.
- So that automated monitoring of BA and BSA FireFighter Id usage can go to the appropriate business manager, separate FireFighter Users have been set up for each business area manager (the FFID Controller). Typically the same role is assigned to several FF R/3 Users, as the BA/BSA needs the same access no matter which manager requested the FireFighter usage.
- Use of FF will require an RT Ticket to be created and justification and details of its usage are documented there.



GRC FireFighter terminology

- R/3 FireFighter User: the R/3 User called up by GRC when the FireFighter requests access via GRC it cannot be accessed in SAP R/3 directly.
- **FireFighter** the business user, BA or BSA or BSA Manager or IS&T Developer or IS&T Developer Manager, SAPADM user or SAPADM manager who needs access to the R/3 FireFighter User in Production.
- **FireFighter Id** the GRC object used to control access to the R/3 FireFighter User it links the R/3 FireFighter User to the FireFighter.
- FireFighter's R/3 Role Owner like the standard R/3 Security Role Owner will usually be the same as the FireFighter ID Owner.
- FireFighter ID Owner requests/approves GRC assignment of Users to FF Ids. GRC functionality for FFID Owner is not being used.
- FireFighter ID Controller informed of FF usage at start and end of session and reviews logs. Typically the Business Role Owner.
- FireFighter ID Controller's Delegate Not currently being used at MIT.

Roles & Responsibilities for Process 4:

•	SAP R/3 Security Admin	Maintain FireFighter and Support Users in SAP, and their assignment to MIT personnel		
•	GRC Admin	Maintain FFIDs and assignments - also can maintain R/3 Users.		
•	FFID Owner	Requests user assignment to FFIDs and any new FFIDs		
		For VPF, this varies per business area. May be Risk Owner or Role Owner.		

- For IS&T, these are Frank and Siobhan
- FFID Controller
 Review FFID actions.
 For VPF, this is Controller or Director level.
 May be Role Owner or Business Area manager.
 - For IS&T this is Bart

• FireFighter



Process 4: FireFighter Users and Roles - Detailed Steps

P.4 STEP	Business Role	Responsibility / Action	Output	Details
1a	R/3 Security Admin	Create FireFighter Roles	• Roles	 There are several types of FF roles: Business Analysts (BA) IS&T Business System Analysts (BSA) IS&T Basis Role IS&T Developers IS&T Managers Business users – limited and specific to each requirement (mostly for back-up) The Role Provisioning process (requesting, approving, auctioning, and testing) is no different to any other role – except that SOD issues are not relevant.
1b	R/3 Security Admin	Maintain FireFighter Roles	Roles updated	Changes should be infrequent, once the system matures: Add new Functionality Remove The Role Provisioning process (requesting, approving, auctioning, and testing) is no different to any other role — except that SOD issues are not relevant. There are special designated approvers for changes to FF roles: FFID Owner for BAS FFID Owner for IS&T FireFighters FFID Owner for Business FF = Risk Owner of the business area?
1c	R/3 Security Admin	Maintain IS&T Support Roles	Roles updated	 IS&T Support Roles These are Display only roles and are in daily use. They are not part of the "FireFighter" control process. The Role Provisioning process (requesting, approving, auctioning, and testing) is no different to any other role. There must be NO SOD ISSUES in these roles.



P.4 STEP	Business Role	Responsibility / Action	Output	Details
2A	R/3 Security Admin	Maintain FireFighter Users	 Users updated Business Roles assigned FireFighter role assigned 	 The R/3 FireFighter Users are generic in that they are assigned to anyone / more than one person via the GRC system. See Step 4.c New R/3 FireFighter Users will be infrequent - perhaps if there is a whole new area of SAP implemented. Creation of R/3 FF Users is a manual process (cf. regular Kerberos R/3 users are automatically created during MIT on-boarding.) The R/3 FireFighter User is assigned the special FireFighter role with some RFC access privileges (identified in the GRC system parameter 4010 as Z_SAP_GRAC_EAM_FFID). This identifies the FireFighter R/3 User to GRC as a FireFighter. Also the User Type = SERVICE, as the login is activated/controlled by a call from the GRC system when the user logs into the FF ID from GRC.
2B	R/3 Security Admin	Lock/Unlock R/3 Users	R/3 User locked or unlocked	Like any other R/3 User, the R/3 FireFighter user can have validity periods (not used much at MIT) or can be locked / unlocked to control access. • Users are created in Production – so may be locked until needed.
3	Basis / GRC	Synch systems : SAP to GRC Repository	• GRC = ECC	An automated process makes sure that the GRC system has up-to-date information from SAP R/3 about roles and users. In this case, specific to FireFighters: The FireFighter R/3 User needed for step 4.A The Business R/3 Users are needed for step 4A, 4B and 4C Any new FireFighter roles – in case GRC-ARA analysis is needed (not at MIT).



P.4 STEP	Business Role	Responsibility / Action	Output	Details
4A	GRC Admin	Maintain FFIDs	• FF Ids in GRC-EAM	The GRC FFID attribute settings are central to the control and usage of the FireFighter roles in R/3 In this step the following updates are made in the GRC-EAM system: The FFID is created— with the same naming convention as the SAP R/3 FireFighter user - like FF_FAR_01. The FFID is assigned to the matching SAP R/3 FireFighter User. The FFID is assigned to an FFID Owner — at MIT this is mostly for information only, as the FFID Owner will not be logging in to GRC to maintain user assignment. Additional information for the FFID can be added if required. The GRC FFIDs are mostly set up during the initial phase of the GRC project, and is related to the business organization, so additions will be less frequent.
4B	GRC Admin	Assign FFID Controllers NOTE: FFID Controller "Delegates" not currently used at MIT	FF Id assigned to FFID Controller (SAP R/3 User)	 In this step an FFID is assigned an FFID Controller (which is another R/3 User): The FFID Controller is emailed when the FFID user logs in and logs out – with a link to the FFID detailed usage logs after logging out. For the VPF business areas, the VPF business managers are the FFID Controllers – for the Business FF, BA FF and BSA FF. For non-VPF areas, there are FFID Controllers in IS&T so that the BSA FFID usage can be monitored.
4C	GRC Admin	Assign FFID to SAP Users	FF Id assigned to SAP R/3 Users	In this step an FFID is assigned the R/3 User who is the actual FF person - and this is a different R/3 user than the FFID's Controller. • An FFID can be assigned to several R/3 users • An R/3 User can be assigned to several FFIDs • The assignment can be for a limited period.



P.4 STEP	Business Role	Responsibility / Action	Output	Details
5A	GRC Admin	Grant appropriate access to the GRC system	Assign GRC access rights to R/3 Users	There are several types of GRC users who need specific access privileges in GRC – predefined in GRC access roles: a. FFID Owners (although MIT is not really using this feature) – GRC Role = Z_FFID_OWNER b. FFID Controllers GRC Role = Z_FF_CONTROLLER c. FFID Users – those who have to log in to the FFID. GRC Role = Z_FF_ENDUSER d. Other MIT users who may want to run FF-related reports. This data will typically need updating as users change their job positions or when they join / leave the MIT workforce.
5B	GRC Admin	Amend FFID / Controller assignment	FF Id assigned to different Controller	This assignment will typically need updating where the FFID Controller changes jobs, leaves MIT or if there is a Departmental Reorganization. O Change the assignment (an FFID has only one Controller) An RT Ticket is required, plus a new Form – GRC FireFighter ID Assignment Change request. Note: if this reassignment is made after the event, the FFID logs can still be reviewed through FRC-EAM reporting.
5C	GRC Admin	Amend FFID / SAP User assignment	FF Id assigned to different SAP Users	This assignment in GRC will need updating when the R/3 User changes jobs, leaves MIT or perhaps if there is a Departmental Reorganization. O Add an assignment – with a future "Valid From" date if known in advance. O Remove an assignment ad amend the "Valid To" date if move is know in advance? An RT Ticket is required, plus a new Form – GRC FireFighter ID Assignment Change request.



P.4 STEP	Business Role	Responsibility / Action	Output	Details
6	FireFighter Controller / Business Manager	Request FF usage	RT ticket	An RT Ticket is required where the business manager has requested support from BA/BSA etc with justification and details of expected usage.
7a	SAP User	Log into the FFID	 RT ticket, if not already created Email to FFID Controller 	The Business FireFighters performing back-up / unusual work do not need a ticket. Otherwise there is an RT Ticket either from step 6. or created by the BA or BSA based on email from the Business Manager (FireFighter Controller). Also, a "Reason Code" is selected when logging in to the FFID, and additional information can be entered by the FireFighter. When the FFID is used, • an email is sent immediately to the FFID Controller
				an activity log is started and is updated hourly
7b	SAP User	Log out of the FFID		Where there is an RT Ticket, any additional / unexpected FireFighter usage will be noted on the RT ticket by the FireFighter.
				When the user logs out of the FFID, within the hour the activity log is updated and an email is sent to the FFID Controller with a link to the Activity Log for that FFID and time period it was used.



P.4 STEP	Business Role	Responsibility / Action	Output	Details
8	FFID Controller	Review, Question, Follow-up	Approval or action list	 The email from GRC to the FFID Controller is a request for approval and a link to the details action log. Action logs are reviewed – looking for unusual activities in general, and activities inconsistent with the Business FireFighters have limited, pre-approved access, so it is unlikely that anything will result from review of the logs alone. For the other FireFighters, any master data changes or financial postings need to be reviewed and approved – a common technique for this is printing the log and initialing each line that was verified. In SAP the master data change history and financial documents are available for review at any point afterwards. The reviewer's options are to: Request the FireFighter to provide more details Approve the whole log. "Hold" the log – i.e. not approve it yet. The work item will stay in their GRC inbox for subsequent processing. Additional notes can be made on the log for any action to be taken.
9	Reporting Actions	Review FFID usage and Activity Logs at any time	Reports – some of the standard reports will be used – Log Summary and Consolidated Log (see next two pages)	Emergency Access Management Reports View details related to reviewing Emergency Access User Activities Quick Links Consolidated Log Report Invalid Superuser Report Firefighter Log Summary Report Reason Code and Activity Report Transaction Log and Session Details SOD Conflict Report for Firefighter IDs



