



TFS 2010
How to manage Team Project Security

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Introduction

When the installation and configuration of Team Foundation Server has been completed, it's time to think about how you will handle security rights and permissions across the different TFS Components (TFS, Reporting Services and SharePoint).

But before the security task you will also need to act on a *Team Project Collection* and *Team Project* strategy. Team Project Collections are introduced in Team Foundation Server 2010 and may contain one or many Team Projects. Read this [article on MSDN](#) for more information on [organizing TFS with multiple Team Project Collections](#).

In this document I will only describe a common approach how to handle security rights and permissions for Team Projects in Team Foundation Server 2010.

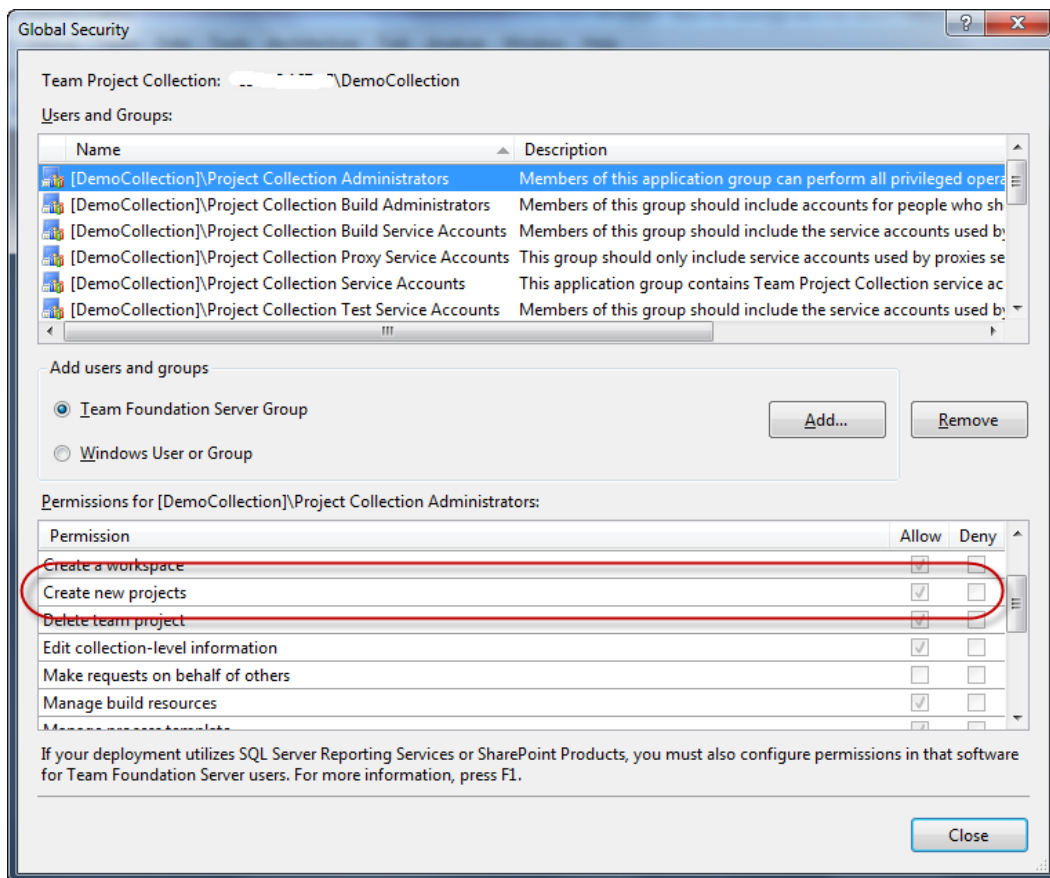
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New Team Project

For creating a new Team Project in an existing Team Project Collection, you need to be part of the “Team Project Collection Administrators” group.

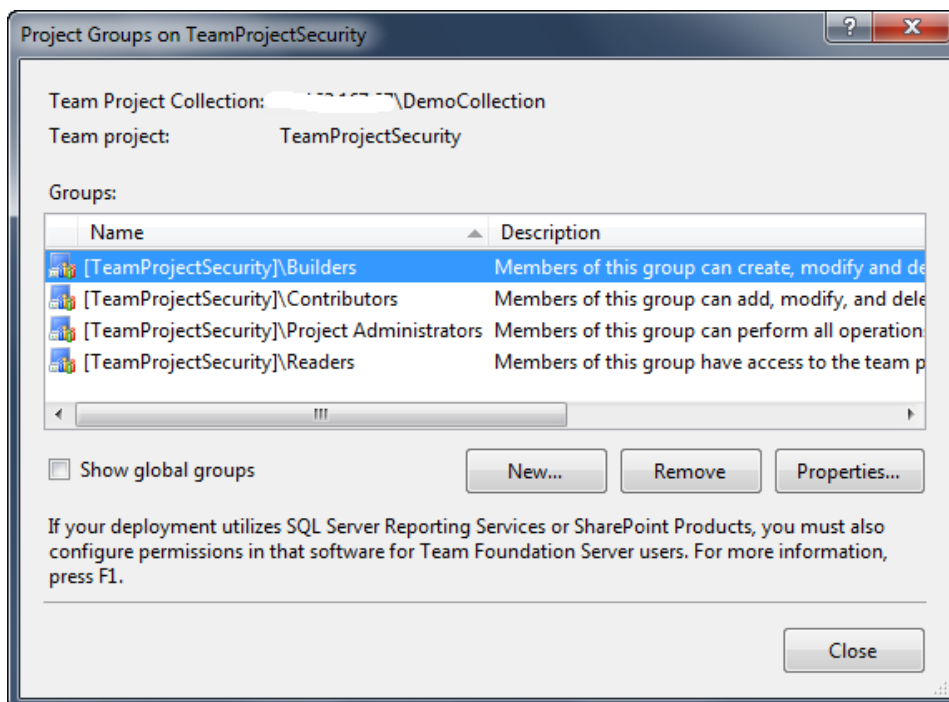
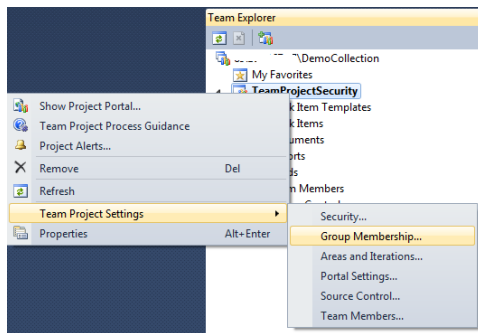


Creating a new Team Project can be done in Team Explorer by right-clicking the Team Project Collection and choosing “New Team Project ...”.



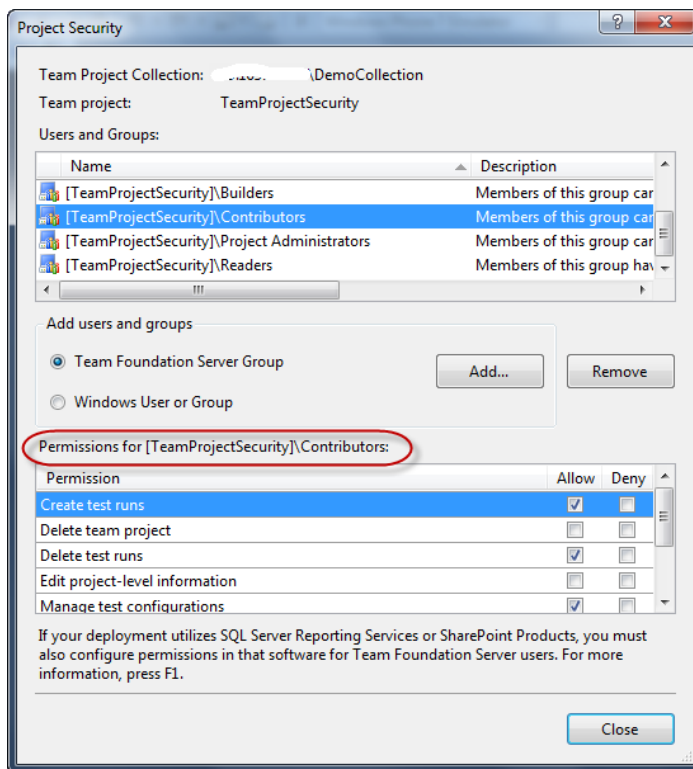
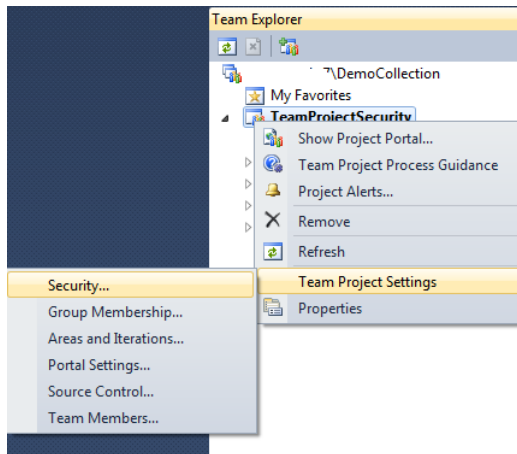
Group Membership for Team Project

Once a Team Project is created by the Team Project creation wizard, 4 Project Groups are defined on the newly created Team Project: Builders, Contributors, Project Administrators and Readers.





All those project groups have a different permission set.



Note that these project groups and the according permissions are defined in the chosen process template. You are able to add project groups and you may modify existing permission sets.

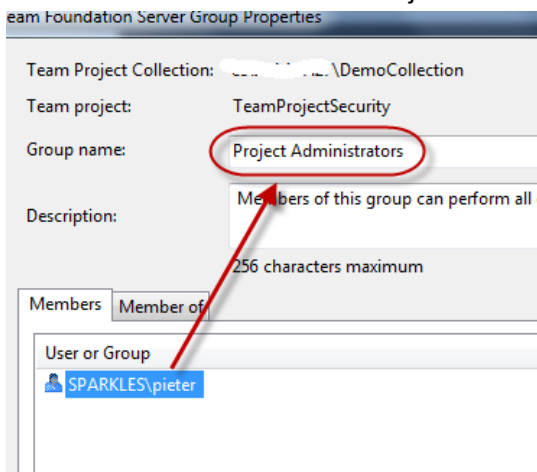


What about security for SharePoint and Reporting?

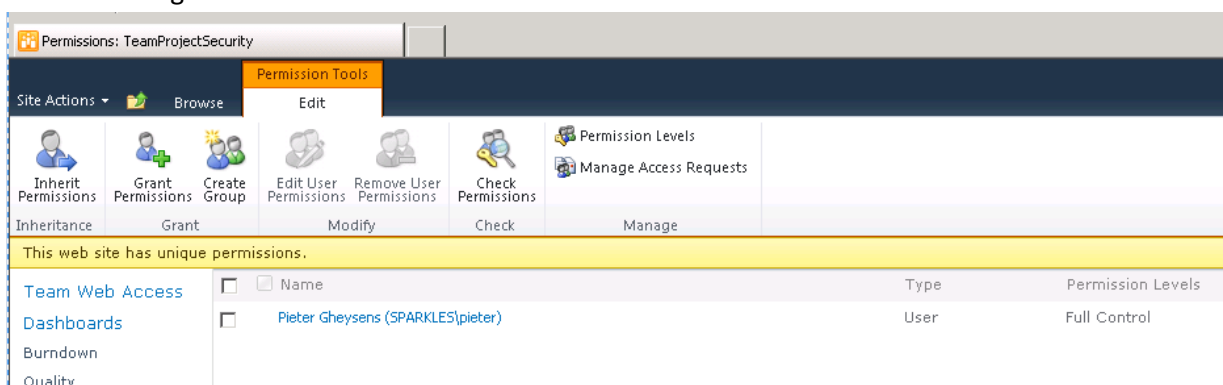
The Project Groups defined above only handle security for Team Foundation Server and not the security rights and permissions for the other involved TFS components: SharePoint and SQL Server Reporting Services. Those security rights and permission are managed separately.

At Team Project creation time, only the account that was used to setup the Team Project gets the appropriate security rights and permissions across all platforms:

- User account is added to the “Project Administrators” role

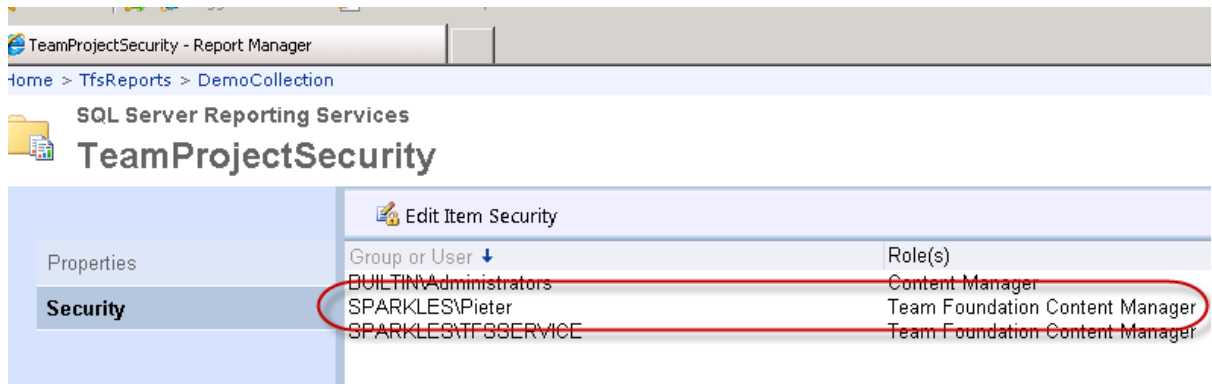


- User account gets full control on the associated SharePoint Team Portal website

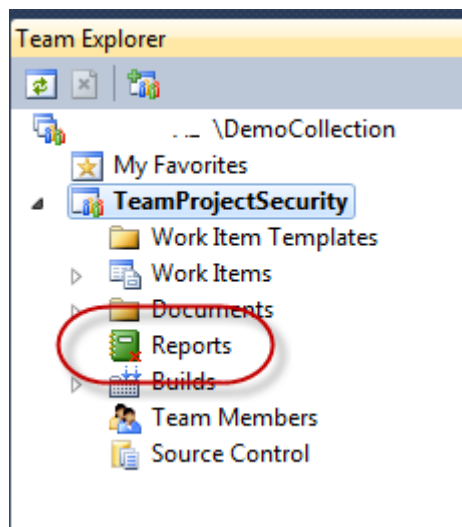




- User account is added to the *Team Foundation Content Manager* Role for the Team Project Reports section (SQL Server Reporting Services)



When a new team member needs access to the different TFS components, you will need to assign the required permissions on all these components individually. If you only assign the appropriate rights on Team Foundation Server in the Project Groups of the involved Team Project, that user will not have the desired permissions on SharePoint and Reporting Services. That's the familiar situation of the red cross for "Documents" and/or "Reports".



In the end, this requires a lot of manual work to set the desired security rights of all individual team members that are added/removed during the life of a Team Project ...

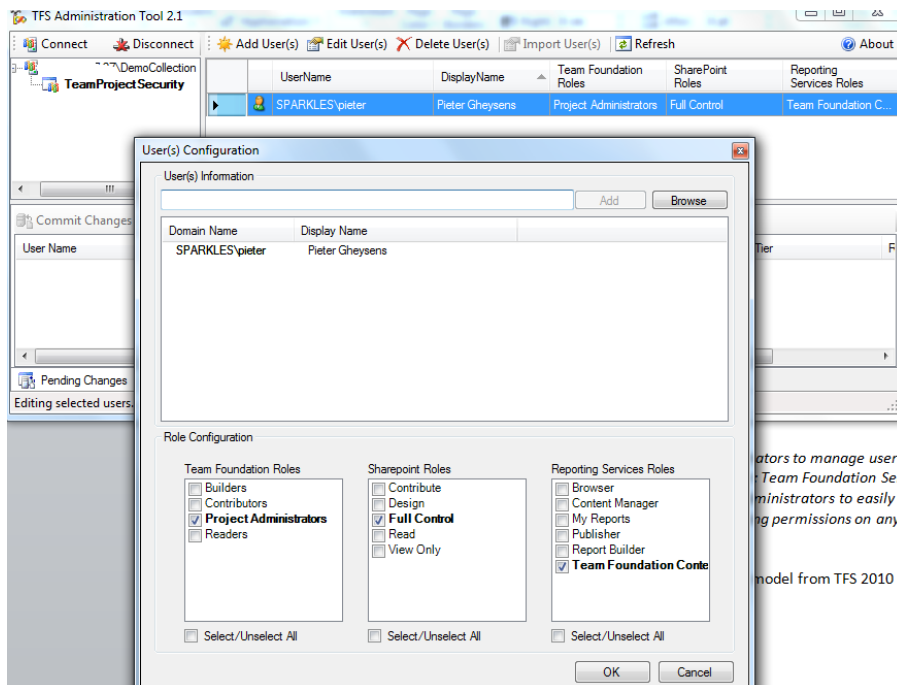


Welcoming the TFS Administration Tool (v2.1)

Luckily a tool has been published at Codeplex (<http://tfsadmin.codeplex.com/>) that will make life of TFS Administrators a bit easier.

The TFS Administration Tool allows Team Foundation Server administrators to manage user permissions on all three platforms utilized by Team Foundation Server: Team Foundation Server, SharePoint, and SQL Server Reporting Services. The tool also allows administrators to easily copy user permissions among team projects and to easily identify any missing permissions on any of the three platforms.

The v2.1 release is the first release which is built on top of the object model from TFS 2010 (only prerequisite = Team Explorer 2010).



The screenshot above shows the situation that was used in the previous paragraphs. My user account was added during the Team Project creation as a Project Admin in TFS, got Full Control on the SharePoint website and became part of the Team Foundation Content Manager role on SQL Reporting Services. Adding/Removing users on all platforms has now been centralized.



Make use of Active Directory groups

To go one step further, it's really recommended to use Active Directory groups to manage security rights and permissions across all TFS components. Instead of assigning security rights and permissions to individual user accounts, it's better to work with Active Directory (AD) groups. Just after a Team Project has been created, you will need to manufacture an Active Directory group for Project Administrators, Contributors and Readers. With the Tfs Admin tool, you can then assign the appropriate security rights and permissions to the AD groups. Once the permissions are set for the AD groups across the 3 platforms (TFS, SharePoint and Reporting Services), it will suffice to only add/remove individual user accounts to the AD groups for setting the required access rights.

1. Create Team Project X
2. Create Active Directory groups
 - a. TFS-<TPCName>-<TPName>-Admins
 - b. TFS-<TPCName>-<TPName>-Contributors
 - c. TFS-<TPCName>-<TPName>-Readers
3. Assign appropriate permissions to Active Directory groups via TFS Admin Tool
 - a. "Admins"
 - i. TFS: Project Administrators
 - ii. SharePoint: Full Control
 - iii. Reporting Services: Team Foundation Content Manager
 - b. "Contributors"
 - i. TFS: Contributors
 - ii. SharePoint: Contribute
 - iii. Reporting Services: Browser
 - c. "Readers"
 - i. TFS: Readers
 - ii. SharePoint: Read
 - iii. Reporting Services: Browser
4. Add/Remove individual user accounts to Active Directory groups



Resources & Links

- Organizing your Team Foundation Server with Team Project Collections:
[http://msdn.microsoft.com/en-us/library/dd236915\(VS.100\).aspx](http://msdn.microsoft.com/en-us/library/dd236915(VS.100).aspx)
- Fine-grained permissions in TFS 2010:
<http://intovsts.net/2009/09/03/more-fine-grained-permissions-in-tfs2010/>
- Organizing Your Server with Team Project Collections:
<http://msdn.microsoft.com/en-us/library/dd236915.aspx>
- Team Foundation Server 2010 Permissions:
[http://msdn.microsoft.com/en-us/library/ms252587\(VS.100\).aspx](http://msdn.microsoft.com/en-us/library/ms252587(VS.100).aspx)
- Team Foundation Server Administration Tool v2.1 (Codeplex):
<http://tfsadmin.codeplex.com/>