

SQL Server Tutorial

Part 99 - Table Valued Parameters in SQL Server

Venkat

PRAGIM Technologies

kudvenkat@gmail.com

<http://csharp-video-tutorials.blogspot.com>

PragimTech.com | facebook.com/pragimtech | twitter.com/kudvenkat | 91 99456 99393

In this session we will learn

- Table Valued Parameters in SQL Server

Link to Dot Net Basics, ASP.NET, C#, ADO.NET and SQL Server video series

<http://www.youtube.com/user/kudvenkat/playlists>

Suggested Videos

Part 96 - Logon triggers in SQL Server

Part 97 - SELECT INTO in SQL Server

Part 98 - Difference between where and having in sql server

Table Valued Parameters in SQL Server

If you are in need of the DVD with all the videos and PPT's, please visit
<http://pragimtech.com/order.aspx>

Table Valued Parameter is a new feature introduced in **SQL SERVER 2008**. Table Valued Parameter allows a table (i.e multiple rows of data) to be passed as a parameter to a stored procedure from T-SQL code or from an application. Prior to SQL SERVER 2008, it is not possible to pass a table variable to a stored procedure.

Please note : Table valued parameters must be passed as read-only to stored procedures, functions etc. This means you cannot perform DML operations like INSERT, UPDATE or DELETE on a table-valued parameter in the body of a function, stored procedure etc.

3 steps to pass multiple rows to a stored procedure using Table Valued Parameter

Step 1 : Create User-defined Table Type

Step 2 : Use the User-defined Table Type as a parameter in the stored procedure.

Step 3 : Declare a table variable, insert the data rows and then pass the table variable as a parameter to the stored procedure

Table Valued Parameters in SQL Server

Step 1 : Create User-defined Table Type

```
Create Type EmpTableType as Table
(
    Id int primary key,
    Name nvarchar(50),
    Gender nvarchar(10)
)
```

Step 2 : Use the User-defined Table Type as a parameter in the stored procedure

```
CREATE PROCEDURE spInsertEmployees
@EmpTableType EmpTableType READONLY
AS
BEGIN
    INSERT INTO Employees
    SELECT * FROM @EmpTableType
END
```

Table Valued Parameters in SQL Server

Step 3 : Declare a table variable, insert the data and then pass the table variable as a parameter to the stored procedure

```
-- Declare the Table Variable
DECLARE @EmployeeTableType EmpTableType

-- Insert rows into the Table variable that you want to send to the SP
INSERT INTO @EmployeeTableType VALUES (1, 'Mark', 'Male')
INSERT INTO @EmployeeTableType VALUES (2, 'Mary', 'Female')
INSERT INTO @EmployeeTableType VALUES (3, 'John', 'Male')
INSERT INTO @EmployeeTableType VALUES (4, 'Sara', 'Female')
INSERT INTO @EmployeeTableType VALUES (5, 'Rob', 'Male')

-- Pass the table variable as a parameter to the stored procedure
EXECUTE spInsertEmployees @EmployeeTableType
```

Next Video : How to pass table as a parameter to the stored procedure from an ADO.NET application

Additional Resources

PRAGIM Home Page:

www.PragimTech.com

Resources:

C#, ADO.NET, ASP.NET, SQL Server & MVC youtube Playlists

<http://www.youtube.com/user/kudvenkat/playlists>

Code samples and text version of all the videos on my blog

<http://www.csharp-video-tutorials.blogspot.com>

To receive email alerts when new videos are uploaded, please subscribe to my YOUTUBE channel

www.YouTube.com/kudvenkat

<https://twitter.com/kudvenkat>