DECLARE @TestDate DATETIME

SET @TestDate = '2017-01-01'

SELECT

'The beginning of time' = CONVERT(DATETIME,0),

'Tomorrow' = @TestDate + 1,

'Months since time began plus one' = DATEDIFF(m,0,@TestDate)+1,

'First Day of Next Month with Months int' = DATEADD(m,(DATEDIFF(m,0,@TestDate)+1),0)

SELECT

'First Day of Next Month' = DATEADD(mm, DATEDIFF(m,0,@TestDate)+1,0),

'Last Day of This Month' = DATEADD(mm, DATEDIFF(m,0,@TestDate)+1,0)-1,

'First Day of Last Month' = DATEADD(mm, DATEDIFF(m,0,@TestDate)-1,0),

'Last Day of Last Month' = DATEADD(mm, DATEDIFF(m,0,@TestDate),0)-1,

'Last Day of Next Month' = DATEADD(mm, DATEDIFF(m,0,@TestDate)+2,0)-1

SELECT

'First Day of Next Month' = CONVERT(DATETIME,EOMONTH(@TestDate))+1,

'Last Day of This Month' = CONVERT(DATETIME,EOMONTH(@TestDate)),

'First Day of Last Month' = CONVERT(DATETIME,EOMONTH(@TestDate,-2))+1,

'First Day of This Month' = CONVERT(DATETIME,EOMONTH(@TestDate,-1))+1,

'Last Day of Last Month' = CONVERT(DATETIME,EOMONTH(@TestDate,-1)),

'Last Day of Next Month' = CONVERT(DATETIME,EOMONTH(@TestDate,1))