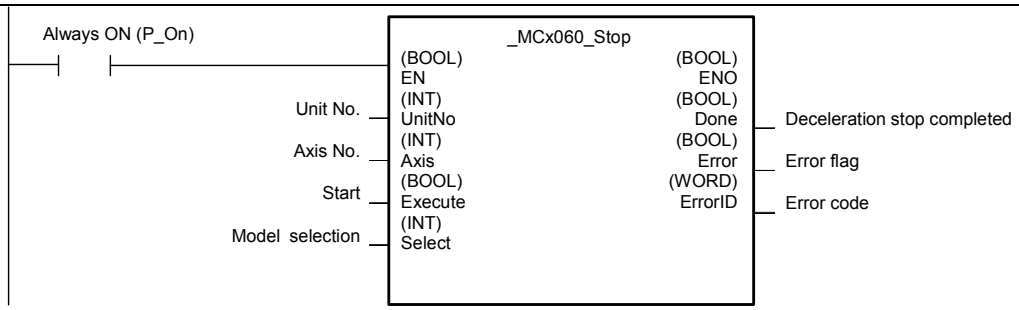
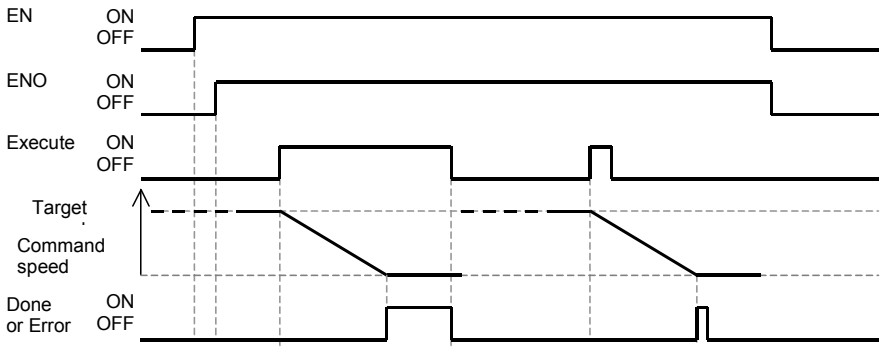
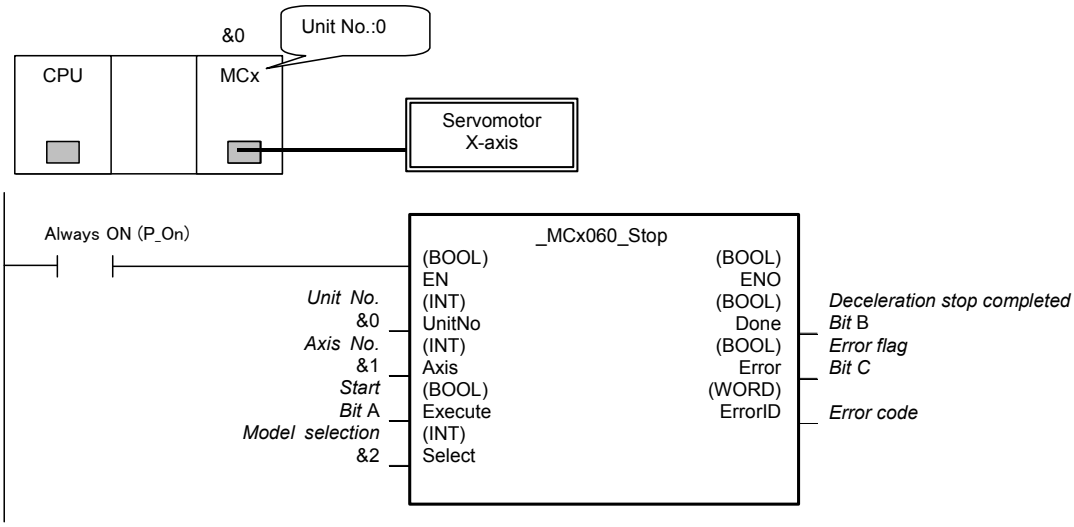
MCx 060	Stop Deceleration: _MCx060_Stop

Basic function	Decelerates an axis to a stop.	
Symbol		
File name	Lib\FBL\omronlib\ PositionController \MCx_MCx060_Stop10.cxf	
Applicable models	Motion Control Unit	CS1W-MC221(-V1)/421(-V1)
	CPU Unit	CS1*-CPU**H Unit version 3.0 or higher CJ1*-CPU**H Unit version 3.0 or higher CJ1M-CPU** Unit version 3.0 or higher CP1H
	CX-Programmer	Version 5.0 or higher
Conditions for usage	None	
Function description	When Start (Execute) turns ON, the operation of the axis specified with Unit No. (UnitNo) and Axis No. (Axis) starts decelerating. Other operation commands are not accepted while Start (Execute) is ON. For details, refer to the explanation on the Deceleration Stop Bits in the manuals listed in Related manuals below. The Deceleration stop completed (Done) will turn ON when a deceleration stop by this FB is completed. It does not turn ON for emergency stops caused by errors. The Error Flag (Error) will be turned ON and the Error Code (Error code) will be output if an error occurs for this FB. These statuses are not output for errors of other FBs or instances. These statuses will be reset when the Start (Execute) turns OFF. If Start (Execute) turns OFF before a deceleration stop is completed, the status will be set for at least one cycle when a corresponding condition occurs.  ■ Reference This FB uses the Deceleration Stop function of the applicable Motion Control Units listed above. For details of the function, refer to the manuals listed in Related manuals below.	
FB precautions	This FB can be used only in Manual Mode. It cannot be used in Automatic Mode. For details, refer to the manuals listed in Related manuals below.	
EN input condition	• Connect the EN input to the Always On Flag (P_On). • If a different type of bit is connected to EN, the FB outputs will be maintained when the connected bit is turned OFF.	
Restrictions Other	• This FB uses bits in the Bit Areas of the applicable Motion Control Units listed above. Do not use these bits as Output Bits connected directly to the right bus bar in the ladder programs. • The Deceleration Stop Bit will turn ON when Start (Execute) turns ON. It will turn OFF when Start (Execute) turns OFF. • No error will occur when the Deceleration Stop Bit is turned OFF by an operation outside of this FB with Deceleration stop completed (Done) ON (Prohibits operation start). **Note** For bit address calculation, these bits are read inside the FB when executing each instance for the first time, or when the Input Variables Unit No. (UnitNo), Axis No. (Axis), and Model selection (Select) are changed and then Start (Execute) is turned ON.	

Application example	Turning the Bit A ON will start decelerating the rotation of the Servomotor (X-axis) connected to the Motion Control Unit of the Unit No.0 to a stop.
Related manuals	CS1W-MC221(-V1)/421(-V1) Motion Control Units Operation Manual (W359)



■ Variable Tables

Input Variables

Name	Variable name	Data type	Default	Range	Description
EN	EN	BOOL			1 (ON): Starts FB 0 (OFF): Does not start FB
Unit No.	UnitNo	INT	&0	&0 to &93 &0 to &91	Depends on the model of Motion Control Units. &0 to &95 (MC221) &0 to &91 (MC421)
Axis No.	Axis	INT	&1	&1 to &4	&1: X-axis &2: Y-axis &3: Z-axis &4: U-axis
Start	Execute	BOOL			↑:Starts deceleration stop ↓:Allows operation start
Model selection	Select	INT	&4	&2, &4	&2: 2-axis Unit (MC221) &4: 4-axis Unit (MC421)

Output Variables

Name	Variable name	Data type	Range	Description
ENO	ENO	BOOL		1 (ON): FB operating normally 0 (OFF): FB not operating normally • FB not started • One or more Input Variables set out of range • FB ended with an error • Parameter not read successfully
Deceleration stop completed	Done	BOOL		1 (ON) indicates that a deceleration stop is completed.
Error flag	Error	BOOL		1 (ON) indicates that an error has occurred in the FB.
Error code	ErrorID	WORD		The error code of the error occurred in the FB will be output. For details of the errors, refer to the manual listed in the Related manuals above. When Unit No. or Axis No. is out of the range or when a bit to be used by this FB is already ON, #0000 will be output.

Version History

Version	Date	Contents
1.00	2005.4	Original production

Note

This manual is a reference that explains the function block functions.
It does not explain the operational limitations of Units, components, or combinations of Units and components. Always read and understand the Operation Manuals for the system's Units and other components before using them.