

Medtronic

2022 Coding resource

Selected cardiothoracic procedures

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To healthcare providers

This Coding Resource includes the MS-DRGs and commonly billed procedure codes for selected cardiac surgery procedures. This is not a comprehensive list of all available codes, and it is possible that there is a more appropriate code for any given procedure.

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A few notes about coding systems and Medicare payment methodologies

ICD-10

ICD-10-CM for diagnosis coding and ICD-10 PCS for inpatient procedure coding became effective October 01, 2015. The new code set replaces the previous ICD-9 coding system. This change does not impact CPT coding for physician and hospital outpatient services. While physician and outpatient procedures will continue to use CPT coding to report procedures, diagnosis coding will be reported using ICD-10 CM.

For more information, please visit the Medicare ICD-10 website at: cms.gov/Medicare/Coding/ICD10/index.html

Hospital inpatient ICD-10 procedure coding and reimbursement

Hospitals assign ICD-10 codes for both diagnoses and procedures for inpatient admissions. For Medicare, inpatient hospital reimbursement is under the Medicare Severity Diagnosis Related Groups (MS-DRG) system. For each admission, the ICD-10 diagnosis and procedure codes are grouped into one of over 750 MS-DRGs. Regardless of the number of codes, only one MS-DRG is assigned to the admission. Each MS-DRG has a unique relative weight, which is then converted into the payment amount. Medicare has used the DRG system for hospital inpatient reimbursement since 1983.

Physician CPT® coding and reimbursement

Physicians use ICD-10 CM codes for diagnoses and CPT codes for procedures, regardless of whether the setting is inpatient or outpatient. The ICD-10 CM diagnosis codes are used for claims adjudication. However, for determining Medicare payment, only the CPT procedure codes are used. For Medicare, physician reimbursement is under the RBRVS system. Each CPT code is assigned a unique relative value unit, which is then converted into the payment amount. Medicare has used RBRVS for physician reimbursement since 1992.

C codes

C codes do not apply to inpatient surgical procedures such as CABG or valve replacement procedures. C codes are used in conjunction with the Medicare prospective payment system for outpatient procedures (APCs).

Medicare severity diagnosis related groups (MS-DRGs)

Conceptual framework

Medicare Severity Diagnosis Related Groups (MS-DRGs) are a significant modification to the prior DRG system, but not a radical one. They retain many of the refinements suggested by users over the year while updating other features. The purpose of the MS-DRGs is to "better recognize severity of illness and resource use based on case complexity." The MS-DRG system was effective on October 1, 2007.

Core changes

The number of DRGs has increased from 538 to over 750 MS-DRGs. There is an addition of severity classification, as illustrated below:

- W MCC (with major complication and comorbidity) over 3,000 listed in the Fed. Register
- W CC (with complication and comorbidity) over 14,000 listed in the Fed. Register
- WO CC/MCC (without complication and comorbidity/major complication and comorbidity)

Severity classifications

As designed, severity and weight increase with each tier. Which severity is assigned depends on each case's secondary diagnosis codes. Regardless of how many secondary diagnoses are present, only one MCC or CC code is needed for the entire case to be assigned to a particular DRG. CMS maintains the list of all ICD-10 CM Codes designated as MCC/CC on their website.

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Medtronic may not carry products used in all procedures.

FY 2022 final Medicare hospital inpatient MS-DRG base rates

(Effective 10/1/2021 to 9/30/2022)

MS-DRG	Description	Relative Weight ¹	FY2022 Medicare National Unadjusted Amount ¹
SURGICAL VALVES			
216	Cardiac valve and other major cardiothoracic procedure with cardiac catheterization with MCC	10.0393	\$66,202
217	Cardiac valve and other major cardiothoracic procedure with cardiac catheterization with CC	6.4835	\$42,754
218	Cardiac valve and other major cardiothoracic procedure with cardiac catheterization without CC/MCC	6.1093	\$40,287
219	Cardiac valve and other major cardiothoracic procedure without cardiac catheterization with MCC	8.0576	\$53,134
220	Cardiac valve and other major cardiothoracic procedure without cardiac catheterization with CC	5.4053	\$35,644
221	Cardiac valve and other major cardiothoracic procedure without cardiac catheterization without CC/MCC	4.5799	\$30,201
TRANSCATHETER VALVES			
266	Endovascular Cardiac Valve Replacement and Supplement Procedures with MCC	7.0479	\$46,476
267	Endovascular Cardiac Valve Replacement and Supplement Procedures without MCC	5.5980	\$36,915
CORONARY BYPASS			
231	Coronary bypass with PTCA with MCC	8.7159	\$57,475
232	Coronary bypass with PTCA without MCC	5.9538	\$39,261
233	Coronary bypass with cardiac catheterization with MCC	7.9223	\$52,242
234	Coronary bypass with cardiac catheterization without MCC	5.3360	\$35,187
235	Coronary bypass without cardiac catheterization with MCC	6.1041	\$40,252
236	Coronary bypass without cardiac catheterization without MCC	4.0970	\$27,017
OTHER CARDIOTHORACIC PROCEDURES			
228	Other cardiothoracic procedure with MCC	5.3303	\$35,150
229	Other cardiothoracic procedure with CC	3.4412	\$22,692
EXTRACORPOREAL MEMBRANE OXYGENATION (ECMO)			
003	ECMO or tracheostomy with MV > 96 hours or principal diagnosis except face, mouth, and neck with major O.R. procedures	19.1055	\$125,988

Hospital ICD-10 PCS potential codes

Note: The ICD-10 PCS codes shown are those that reflect the typical procedure, using known Medtronic devices where appropriate. Theoretical possibilities are not shown, e.g., approaches that are not common, device types that are not currently on the market. The general equivalence between ICD-9 procedures codes and ICD-10 PCS codes shown here is for illustrative purposes. Please refer to clinical documentation for appropriate ICD-10 PCS code selection.

Valve procedures		
Procedure Code Description	ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
ENDOVASCULAR VALVE REPLACEMENT PROCEDURES		
Endovascular replacement of aortic valve	02RF37Z	Replacement of Aortic Valve with Autologous Tissue Substitute, Percutaneous Approach
	02RF38Z	Replacement of Aortic Valve with Zooplasic Tissue, Percutaneous Approach
	02RF3JZ	Replacement of Aortic Valve with Synthetic Substitute, Percutaneous Approach
	02RF3KZ	Replacement of Aortic Valve with Nonautologous Tissue Substitute, Percutaneous Approach
Endovascular replacement of pulmonary valve	02RH37Z	Replacement of Pulmonary Valve with Autologous Tissue Substitute, Percutaneous Approach
	02RH3JZ	Replacement of Pulmonary Valve with Synthetic Substitute, Percutaneous Approach
	02RH3KZ	Replacement of Pulmonary Valve with Nonautologous Tissue Substitute, Percutaneous Approach
	02RH38L	Replacement of Pulmonary Valve with Zooplasic Tissue, In Existing Conduit, Percutaneous Approach
	02RH38M	Replacement of Pulmonary Valve with Zooplasic Tissue, Native Site, Percutaneous Approach
	02RH38Z	Replacement of Pulmonary Valve with Zooplasic Tissue, Percutaneous Approach
OPEN HEART VALVULOPLASTY WITHOUT REPLACEMENT		
Open heart valvuloplasty of aortic valve without replacement	027F0ZZ	Dilation of Aortic Valve, Open Approach
	02NF0ZZ	Release Aortic Valve, Open Approach
	02QF0ZZ	Repair Aortic Valve, Open Approach
Open heart valvuloplasty of mitral valve without replacement	027G0ZZ	Dilation of Mitral Valve, Open Approach
	02NG0ZZ	Release Mitral Valve, Open Approach
	02QG0ZZ	Repair Mitral Valve, Open Approach
Open heart valvuloplasty of pulmonary valve without replacement	027H0ZZ	Dilation of Pulmonary Valve, Open Approach
	02NH0ZZ	Release Pulmonary Valve, Open Approach
	02QH0ZZ	Repair Pulmonary Valve, Open Approach

Valve procedures, cont'd.

Procedure Code Description	ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
OPEN VALVE REPLACEMENT PROCEDURES		
Open heart valvuloplasty of tricuspid valve without replacement	027J0ZZ	Dilation of Tricuspid Valve, Open Approach
	02NJ0ZZ	Release Tricuspid Valve, Open Approach
	02QJ0ZZ	Repair Tricuspid Valve, Open Approach
Open and other replacement of aortic valve with tissue graft	02RF07Z	Replacement of Aortic Valve with Autologous Tissue Substitute, Open Approach
	02RF08Z	Replacement of Aortic Valve with Zooplasic Tissue, Open Approach
	02RF0KZ	Replacement of Aortic Valve with Nonautologous Tissue Substitute, Open Approach
Open and other replacement of aortic valve	02RF0JZ	Replacement of Aortic Valve with Synthetic Substitute, Open Approach
Open and other replacement of mitral valve with tissue graft	02RG07Z	Replacement of Mitral Valve with Autologous Tissue Substitute, Open Approach
	02RG08Z	Replacement of Mitral Valve with Zooplasic Tissue, Open Approach
	02RG0KZ	Replacement of Mitral Valve with Nonautologous Tissue Substitute, Open Approach
Open and other replacement of mitral valve	02RG0JZ	Replacement of Mitral Valve with Synthetic Substitute, Open Approach
Open and other replacement of pulmonary valve with tissue graft	02RH07Z	Replacement of Pulmonary Valve with Autologous Tissue Substitute, Open Approach
	02RH08Z	Replacement of Pulmonary Valve with Zooplasic Tissue, Open Approach
	02RH0KZ	Replacement of Pulmonary Valve with Nonautologous Tissue Substitute, Open Approach
Open and other replacement of pulmonary valve	02RH0JZ	Replacement of Pulmonary Valve with Synthetic Substitute, Open Approach
Open and other replacement of tricuspid valve with tissue graft	02RJ07Z	Replacement of Tricuspid Valve with Autologous Tissue Substitute, Open Approach
	02RJ08Z	Replacement of Tricuspid Valve with Zooplasic Tissue, Open Approach
	02RJ0KZ	Replacement of Tricuspid Valve with Nonautologous Tissue Substitute, Open Approach
Open and other replacement of tricuspid valve	02RJ0JZ	Replacement of Tricuspid Valve with Synthetic Substitute, Open Approach
OTHER VALVE PROCEDURES		
Annuloplasty	02UF0JZ	Supplement Aortic Valve with Synthetic Substitute, Open Approach
	02UG0JZ	Supplement Mitral Valve with Synthetic Substitute, Open Approach
	02UH0JZ	Supplement Pulmonary Valve with Synthetic Substitute, Open Approach
	02UJ0JZ	Supplement Tricuspid Valve with Synthetic Substitute, Open Approach
Infundibulectomy	02BK0ZZ	Excision of Right Ventricle, Open Approach

Valve procedures, cont'd.

Procedure Code Description	ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
OPEN VALVE REPLACEMENT PROCEDURES		
Open and other replacement of aortic valve with tissue graft	02RF07Z	Replacement of Aortic Valve with Autologous Tissue Substitute, Open Approach
	02RF08Z	Replacement of Aortic Valve with Zooplasic Tissue, Open Approach
	02RF0KZ	Replacement of Aortic Valve with Nonautologous Tissue Substitute, Open Approach
Open and other replacement of aortic valve	02RF0JZ	Replacement of Aortic Valve with Synthetic Substitute, Open Approach
Open and other replacement of mitral valve with tissue graft	02RG07Z	Replacement of Mitral Valve with Autologous Tissue Substitute, Open Approach
	02RG08Z	Replacement of Mitral Valve with Zooplasic Tissue, Open Approach
	02RG0KZ	Replacement of Mitral Valve with Nonautologous Tissue Substitute, Open Approach
Open and other replacement of mitral valve	02RG0JZ	Replacement of Mitral Valve with Synthetic Substitute, Open Approach
Open and other replacement of pulmonary valve with tissue graft	02RH07Z	Replacement of Pulmonary Valve with Autologous Tissue Substitute, Open Approach
	02RH08Z	Replacement of Pulmonary Valve with Zooplasic Tissue, Open Approach
	02RH0KZ	Replacement of Pulmonary Valve with Nonautologous Tissue Substitute, Open Approach
Open and other replacement of pulmonary valve	02RH0JZ	Replacement of Pulmonary Valve with Synthetic Substitute, Open Approach
Open and other replacement of tricuspid valve with tissue graft	02RJ07Z	Replacement of Tricuspid Valve with Autologous Tissue Substitute, Open Approach
	02RJ08Z	Replacement of Tricuspid Valve with Zooplasic Tissue, Open Approach
	02RJ0KZ	Replacement of Tricuspid Valve with Nonautologous Tissue Substitute, Open Approach
Open and other replacement of tricuspid valve	02RJ0JZ	Replacement of Tricuspid Valve with Synthetic Substitute, Open Approach
OTHER VALVE PROCEDURES		
Annuloplasty	02UF0JZ	Supplement Aortic Valve with Synthetic Substitute, Open Approach
	02UG0JZ	Supplement Mitral Valve with Synthetic Substitute, Open Approach
	02UH0JZ	Supplement Pulmonary Valve with Synthetic Substitute, Open Approach
	02UJ0JZ	Supplement Tricuspid Valve with Synthetic Substitute, Open Approach
Infundibulectomy	02BK0ZZ	Excision of Right Ventricle, Open Approach
Percutaneous balloon valvuloplasty	027F3ZZ	Dilation of Aortic Valve, Percutaneous Approach
	027G3ZZ	Dilation of Mitral Valve, Percutaneous Approach
	027H3ZZ	Dilation of Pulmonary Valve, Percutaneous Approach
	027J3ZZ	Dilation of Tricuspid Valve, Percutaneous Approach
Percutaneous mitral valve repair with implant	02UG3JZ	Supplement Mitral Valve with Synthetic Substitute, Percutaneous Approach

Perfusion

Procedure Code Description	ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
Cardiopulmonary Bypass	5A1221Z	Performance of Cardiac Output, Continuous

Continious extracorporeal membrane oxygenation (ECMO)

CPT Code	Procedure Description	ICD-10 PCS Code
Central ECMO	Extracorporeal Oxygenation, Membrane, Central	5A1522F
Veno-arterial (VA-ECMO)	Extracorporeal Oxygenation, Membrane, Peripheral Veno-arterial	5A1522G
Veno-venous (VV-ECMO)	Extracorporeal Oxygenation, Membrane, Peripheral Veno-venous	5A1522H

Intraoperative extracorporeal membrane oxygenation (ECMO)

CPT Code	Procedure Description	ICD-10 PCS Code
Intraoperative ECMO, Central	Extracorporeal Oxygenation, Membrane, Central, Intraoperative	5A15A2F
Intraoperative VA-ECMO	Extracorporeal Oxygenation, Membrane, Peripheral Veno-arterial, Intraoperative	5A15A2G
Intraoperative VV-ECMO	Extracorporeal Oxygenation, Membrane, Peripheral Veno-venous, Intraoperative	5A15A2H

ICD-10 PCS codes for CABG procedures

ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
0210093	Bypass Coronary Artery, One Site from Coronary Artery with Autologous Venous Tissue, Open Approach
0210098	Bypass Coronary Artery, One Site from Right Internal Mammary with Autologous Venous Tissue, Open Approach
0210099	Bypass Coronary Artery, One Site from Left Internal Mammary with Autologous Venous Tissue, Open Approach
021009C	Bypass Coronary Artery, One Site from Thoracic Artery with Autologous Venous Tissue, Open Approach
021009F	Bypass Coronary Artery, One Site from Abdominal Artery with Autologous Venous Tissue, Open Approach
021009W	Bypass Coronary Artery, One Site from Aorta with Autologous Venous Tissue, Open Approach
02100A3	Bypass Coronary Artery, One Site from Coronary Artery with Autologous Arterial Tissue, Open Approach
02100A8	Bypass Coronary Artery, One Site from Right Internal Mammary with Autologous Arterial Tissue, Open Approach
02100A9	Bypass Coronary Artery, One Site from Left Internal Mammary with Autologous Arterial Tissue, Open Approach
02100AC	Bypass Coronary Artery, One Site from Thoracic Artery with Autologous Arterial Tissue, Open Approach
02100AF	Bypass Coronary Artery, One Site from Abdominal Artery with Autologous Arterial Tissue, Open Approach
02100AW	Bypass Coronary Artery, One Site from Aorta with Autologous Arterial Tissue, Open Approach
02100J3	Bypass Coronary Artery, One Site from Coronary Artery with Synthetic Substitute, Open Approach
02100J8	Bypass Coronary Artery, One Site from Right Internal Mammary with Synthetic Substitute, Open Approach
02100J9	Bypass Coronary Artery, One Site from Left Internal Mammary with Synthetic Substitute, Open Approach
02100JC	Bypass Coronary Artery, One Site from Thoracic Artery with Synthetic Substitute, Open Approach
02100JF	Bypass Coronary Artery, One Site from Abdominal Artery with Synthetic Substitute, Open Approach
02100JW	Bypass Coronary Artery, One Site from Aorta with Synthetic Substitute, Open Approach
02100K3	Bypass Coronary Artery, One Site from Coronary Artery with Nonautologous Tissue Substitute, Open Approach
02100K8	Bypass Coronary Artery, One Site from Right Internal Mammary with Nonautologous Tissue Substitute, Open Approach
02100K9	Bypass Coronary Artery, One Site from Left Internal Mammary with Nonautologous Tissue Substitute, Open Approach
02100KC	Bypass Coronary Artery, One Site from Thoracic Artery with Nonautologous Tissue Substitute, Open Approach
02100KF	Bypass Coronary Artery, One Site from Abdominal Artery with Nonautologous Tissue Substitute, Open Approach
02100KW	Bypass Coronary Artery, One Site from Aorta with Nonautologous Tissue Substitute, Open Approach
02100Z3	Bypass Coronary Artery, One Site from Coronary Artery, Open Approach
02100Z8	Bypass Coronary Artery, One Site from Right Internal Mammary, Open Approach
02100Z9	Bypass Coronary Artery, One Site from Left Internal Mammary, Open Approach
02100ZC	Bypass Coronary Artery, One Site from Thoracic Artery, Open Approach
02100ZF	Bypass Coronary Artery, One Site from Abdominal Artery, Open Approach
0210493	Bypass Coronary Artery, One Site from Coronary Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
0210498	Bypass Coronary Artery, One Site from Right Internal Mammary with Autologous Venous Tissue, Percutaneous Endoscopic Approach
0210499	Bypass Coronary Artery, One Site from Left Internal Mammary with Autologous Venous Tissue, Percutaneous Endoscopic Approach

ICD-10 PCS codes for CABG procedures, cont'd

ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
021049C	Bypass Coronary Artery, One Site from Thoracic Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021049F	Bypass Coronary Artery, One Site from Abdominal Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021049W	Bypass Coronary Artery, One Site from Aorta with Autologous Venous Tissue, Percutaneous Endoscopic Approach
02104A3	Bypass Coronary Artery, One Site from Coronary Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02104A8	Bypass Coronary Artery, One Site from Right Internal Mammary with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02104A9	Bypass Coronary Artery, One Site from Left Internal Mammary with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02104AC	Bypass Coronary Artery, One Site from Thoracic Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02104AF	Bypass Coronary Artery, One Site from Abdominal Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02104AW	Bypass Coronary Artery, One Site from Aorta with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02104J3	Bypass Coronary Artery, One Site from Coronary Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02104J8	Bypass Coronary Artery, One Site from Right Internal Mammary with Synthetic Substitute, Percutaneous Endoscopic Approach
02104J9	Bypass Coronary Artery, One Site from Left Internal Mammary with Synthetic Substitute, Percutaneous Endoscopic Approach
02104JC	Bypass Coronary Artery, One Site from Thoracic Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02104JF	Bypass Coronary Artery, One Site from Abdominal Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02104JW	Bypass Coronary Artery, One Site from Aorta with Synthetic Substitute, Percutaneous Endoscopic Approach
02104K3	Bypass Coronary Artery, One Site to Coronary Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02104K8	Bypass Coronary Artery, One Site from Right Internal Mammary with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02104K9	Bypass Coronary Artery, One Site from Left Internal Mammary with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02104KC	Bypass Coronary Artery, One Site from Thoracic Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02104KF	Bypass Coronary Artery, One Site from Abdominal Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02104KW	Bypass Coronary Artery, One Site from Aorta with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02104Z3	Bypass Coronary Artery, One Site from Coronary Artery, Percutaneous Endoscopic Approach
02104Z8	Bypass Coronary Artery, One Site from Right Internal Mammary, Percutaneous Endoscopic Approach
02104Z9	Bypass Coronary Artery, One Site from Left Internal Mammary, Percutaneous Endoscopic Approach
02104ZC	Bypass Coronary Artery, One Site from Thoracic Artery, Percutaneous Endoscopic Approach
02104ZF	Bypass Coronary Artery, One Site from Abdominal Artery, Percutaneous Endoscopic Approach
0211093	Bypass Coronary Artery, Two Sites from Coronary Artery with Autologous Venous Tissue, Open Approach
0211098	Bypass Coronary Artery, Two Sites from Right Internal Mammary with Autologous Venous Tissue, Open Approach
0211099	Bypass Coronary Artery, Two Sites from Left Internal Mammary with Autologous Venous Tissue, Open Approach

ICD-10 PCS codes for CABG procedures, cont'd

ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
021109C	Bypass Coronary Artery, Two Sites from Thoracic Artery with Autologous Venous Tissue, Open Approach
021109F	Bypass Coronary Artery, Two Sites from Abdominal Artery with Autologous Venous Tissue, Open Approach
021109W	Bypass Coronary Artery, Two Sites from Aorta with Autologous Venous Tissue, Open Approach
02110A3	Bypass Coronary Artery, Two Sites from Coronary Artery with Autologous Arterial Tissue, Open Approach
02110A8	Bypass Coronary Artery, Two Sites from Right Internal Mammary with Autologous Arterial Tissue, Open Approach
02110A9	Bypass Coronary Artery, Two Sites from Left Internal Mammary with Autologous Arterial Tissue, Open Approach
02110AC	Bypass Coronary Artery, Two Sites from Thoracic Artery with Autologous Arterial Tissue, Open Approach
02110AF	Bypass Coronary Artery, Two Sites from Abdominal Artery with Autologous Arterial Tissue, Open Approach
02110AW	Bypass Coronary Artery, Two Sites from Aorta with Autologous Arterial Tissue, Open Approach
02110J3	Bypass Coronary Artery, Two Sites from Coronary Artery with Synthetic Substitute, Open Approach
02110J8	Bypass Coronary Artery, Two Sites from Right Internal Mammary with Synthetic Substitute, Open Approach
02110J9	Bypass Coronary Artery, Two Sites from Left Internal Mammary with Synthetic Substitute, Open Approach
02110JC	Bypass Coronary Artery, Two Sites from Thoracic Artery with Synthetic Substitute, Open Approach
02110JF	Bypass Coronary Artery, Two Sites from Abdominal Artery with Synthetic Substitute, Open Approach
02110JW	Bypass Coronary Artery, Two Sites from Aorta with Synthetic Substitute, Open Approach
02110K3	Bypass Coronary Artery, Two Sites from Coronary Artery with Nonautologous Tissue Substitute, Open Approach
02110K8	Bypass Coronary Artery, Two Sites from Right Internal Mammary with Nonautologous Tissue Substitute, Open Approach
02110K9	Bypass Coronary Artery, Two Sites from Left Internal Mammary with Nonautologous Tissue Substitute, Open Approach
02110KC	Bypass Coronary Artery, Two Sites from Thoracic Artery with Nonautologous Tissue Substitute, Open Approach
02110KF	Bypass Coronary Artery, Two Sites from Abdominal Artery with Nonautologous Tissue Substitute, Open Approach
02110KW	Bypass Coronary Artery, Two Sites from Aorta with Nonautologous Tissue Substitute, Open Approach
02110Z3	Bypass Coronary Artery, Two Sites from Coronary Artery, Open Approach
02110Z8	Bypass Coronary Artery, Two Sites from Right Internal Mammary, Open Approach
02110Z9	Bypass Coronary Artery, Two Sites from Left Internal Mammary, Open Approach
02110ZC	Bypass Coronary Artery, Two Sites from Thoracic Artery, Open Approach
02110ZF	Bypass Coronary Artery, Two Sites from Abdominal Artery, Open Approach
0211493	Bypass Coronary Artery, Two Sites from Coronary Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
0211498	Bypass Coronary Artery, Two Sites from Right Internal Mammary with Autologous Venous Tissue, Percutaneous Endoscopic Approach
0211499	Bypass Coronary Artery, Two Sites from Left Internal Mammary with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021149C	Bypass Coronary Artery, Two Sites from Thoracic Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021149F	Bypass Coronary Artery, Two Sites from Abdominal Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021149W	Bypass Coronary Artery, Two Sites from Aorta with Autologous Venous Tissue, Percutaneous Endoscopic Approach

ICD-10 PCS codes for CABG procedures, cont'd

ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
02114A3	Bypass Coronary Artery, Two Sites from Coronary Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02114A8	Bypass Coronary Artery, Two Sites from Right Internal Mammary with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02114A9	Bypass Coronary Artery, Two Sites from Left Internal Mammary with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02114AC	Bypass Coronary Artery, Two Sites from Thoracic Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02114AF	Bypass Coronary Artery, Two Sites from Abdominal Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02114AW	Bypass Coronary Artery, Two Sites from Aorta with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02114J3	Bypass Coronary Artery, Two Sites from Coronary Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02114J8	Bypass Coronary Artery, Two Sites from Right Internal Mammary with Synthetic Substitute, Percutaneous Endoscopic Approach
02114J9	Bypass Coronary Artery, Two Sites from Left Internal Mammary with Synthetic Substitute, Percutaneous Endoscopic Approach
02114JC	Bypass Coronary Artery, Two Sites from Thoracic Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02114JF	Bypass Coronary Artery, Two Sites from Abdominal Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02114JW	Bypass Coronary Artery, Two Sites from Aorta with Synthetic Substitute, Percutaneous Endoscopic Approach
02114K3	Bypass Coronary Artery, Two Sites from Coronary Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02114K8	Bypass Coronary Artery, Two Sites from Right Internal Mammary with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02114K9	Bypass Coronary Artery, Two Sites from Left Internal Mammary with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02114KC	Bypass Coronary Artery, Two Sites from Thoracic Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02114KF	Bypass Coronary Artery, Two Sites from Abdominal Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02114KW	Bypass Coronary Artery, Two Sites from Aorta with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02114Z3	Bypass Coronary Artery, Two Sites from Coronary Artery, Percutaneous Endoscopic Approach
02114Z8	Bypass Coronary Artery, Two Sites from Right Internal Mammary, Percutaneous Endoscopic Approach
02114Z9	Bypass Coronary Artery, Two Sites from Left Internal Mammary, Percutaneous Endoscopic Approach
02114ZC	Bypass Coronary Artery, Two Sites from Thoracic Artery, Percutaneous Endoscopic Approach
02114ZF	Bypass Coronary Artery, Two Sites from Abdominal Artery, Percutaneous Endoscopic Approach
0212093	Bypass Coronary Artery, Three Sites from Coronary Artery with Autologous Venous Tissue, Open Approach
0212098	Bypass Coronary Artery, Three Sites from Right Internal Mammary with Autologous Venous Tissue, Open Approach
0212099	Bypass Coronary Artery, Three Sites from Left Internal Mammary with Autologous Venous Tissue, Open Approach
021209C	Bypass Coronary Artery, Three Sites from Thoracic Artery with Autologous Venous Tissue, Open Approach
021209F	Bypass Coronary Artery, Three Sites from Abdominal Artery with Autologous Venous Tissue, Open Approach
021209W	Bypass Coronary Artery, Three Sites from Aorta with Autologous Venous Tissue, Open Approach

ICD-10 PCS codes for CABG procedures, cont'd

ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
02120A3	Bypass Coronary Artery, Three Sites from Coronary Artery with Autologous Arterial Tissue, Open Approach
02120A8	Bypass Coronary Artery, Three Sites from Right Internal Mammary with Autologous Arterial Tissue, Open Approach
02120A9	Bypass Coronary Artery, Three Sites from Left Internal Mammary with Autologous Arterial Tissue, Open Approach
02120AC	Bypass Coronary Artery, Three Sites from Thoracic Artery with Autologous Arterial Tissue, Open Approach
02120AF	Bypass Coronary Artery, Three Sites from Abdominal Artery with Autologous Arterial Tissue, Open Approach
02120AW	Bypass Coronary Artery, Three Sites from Aorta with Autologous Arterial Tissue, Open Approach
02120J3	Bypass Coronary Artery, Three Sites from Coronary Artery with Synthetic Substitute, Open Approach
02120J8	Bypass Coronary Artery, Three Sites from Right Internal Mammary with Synthetic Substitute, Open Approach
02120J9	Bypass Coronary Artery, Three Sites from Left Internal Mammary with Synthetic Substitute, Open Approach
02120JC	Bypass Coronary Artery, Three Sites from Thoracic Artery with Synthetic Substitute, Open Approach
02120JF	Bypass Coronary Artery, Three Sites from Abdominal Artery with Synthetic Substitute, Open Approach
02120JW	Bypass Coronary Artery, Three Sites from Aorta with Synthetic Substitute, Open Approach
02120K3	Bypass Coronary Artery, Three Sites from Coronary Artery with Nonautologous Tissue Substitute, Open Approach
02120K8	Bypass Coronary Artery, Three Sites from Right Internal Mammary with Nonautologous Tissue Substitute, Open Approach
02120K9	Bypass Coronary Artery, Three Sites from Left Internal Mammary with Nonautologous Tissue Substitute, Open Approach
02120KC	Bypass Coronary Artery, Three Sites from Thoracic Artery with Nonautologous Tissue Substitute, Open Approach
02120KF	Bypass Coronary Artery, Three Sites from Abdominal Artery with Nonautologous Tissue Substitute, Open Approach
02120KW	Bypass Coronary Artery, Three Sites from Aorta with Nonautologous Tissue Substitute, Open Approach
02120Z3	Bypass Coronary Artery, Three Sites from Coronary Artery, Open Approach
02120Z8	Bypass Coronary Artery, Three Sites from Right Internal Mammary, Open Approach
02120Z9	Bypass Coronary Artery, Three Sites from Left Internal Mammary, Open Approach
02120ZC	Bypass Coronary Artery, Three Sites from Thoracic Artery, Open Approach
02120ZF	Bypass Coronary Artery, Three Sites from Abdominal Artery, Open Approach
0212493	Bypass Coronary Artery, Three Sites from Coronary Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
0212498	Bypass Coronary Artery, Three Sites from Right Internal Mammary with Autologous Venous Tissue, Percutaneous Endoscopic Approach
0212499	Bypass Coronary Artery, Three Sites from Left Internal Mammary with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021249C	Bypass Coronary Artery, Three Sites from Thoracic Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021249F	Bypass Coronary Artery, Three Sites from Abdominal Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021249W	Bypass Coronary Artery, Three Sites from Aorta with Autologous Venous Tissue, Percutaneous Endoscopic Approach
02124A3	Bypass Coronary Artery, Three Sites from Coronary Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02124A8	Bypass Coronary Artery, Three Sites from Right Internal Mammary with Autologous Arterial Tissue, Percutaneous Endoscopic Approach

ICD-10 PCS codes for CABG procedures, cont'd

ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
02124A9	Bypass Coronary Artery, Three Sites from Left Internal Mammary with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02124AC	Bypass Coronary Artery, Three Sites from Thoracic Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02124AF	Bypass Coronary Artery, Three Sites from Abdominal Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02124AW	Bypass Coronary Artery, Three Sites from Aorta with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02124J3	Bypass Coronary Artery, Three Sites from Coronary Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02124J8	Bypass Coronary Artery, Three Sites from Right Internal Mammary with Synthetic Substitute, Percutaneous Endoscopic Approach
02124J9	Bypass Coronary Artery, Three Sites from Left Internal Mammary with Synthetic Substitute, Percutaneous Endoscopic Approach
02124JC	Bypass Coronary Artery, Three Sites from Thoracic Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02124JF	Bypass Coronary Artery, Three Sites from Abdominal Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02124JW	Bypass Coronary Artery, Three Sites from Aorta with Synthetic Substitute, Percutaneous Endoscopic Approach
02124K3	Bypass Coronary Artery, Three Sites from Coronary Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02124K8	Bypass Coronary Artery, Three Sites from Right Internal Mammary with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02124K9	Bypass Coronary Artery, Three Sites from Left Internal Mammary with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02124KC	Bypass Coronary Artery, Three Sites from Thoracic Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02124KF	Bypass Coronary Artery, Three Sites from Abdominal Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02124KW	Bypass Coronary Artery, Three Sites from Aorta with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02124Z3	Bypass Coronary Artery, Three Sites from Coronary Artery, Percutaneous Endoscopic Approach
02124Z8	Bypass Coronary Artery, Three Sites from Right Internal Mammary, Percutaneous Endoscopic Approach
02124Z9	Bypass Coronary Artery, Three Sites from Left Internal Mammary, Percutaneous Endoscopic Approach
02124ZC	Bypass Coronary Artery, Three Sites from Thoracic Artery, Percutaneous Endoscopic Approach
02124ZF	Bypass Coronary Artery, Three Sites from Abdominal Artery, Percutaneous Endoscopic Approach
0213093	Bypass Coronary Artery, Four or More Sites from Coronary Artery with Autologous Venous Tissue, Open Approach
0213098	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary with Autologous Venous Tissue, Open Approach
0213099	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary with Autologous Venous Tissue, Open Approach
021309C	Bypass Coronary Artery, Four or More Sites from Thoracic Artery with Autologous Venous Tissue, Open Approach
021309F	Bypass Coronary Artery, Four or More Sites from Abdominal Artery with Autologous Venous Tissue, Open Approach
021309W	Bypass Coronary Artery, Four or More Sites from Aorta with Autologous Venous Tissue, Open Approach
02130A3	Bypass Coronary Artery, Four or More Sites from Coronary Artery with Autologous Arterial Tissue, Open Approach

ICD-10 PCS codes for CABG procedures, cont'd

ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
02130A8	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary with Autologous Arterial Tissue, Open Approach
02130A9	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary with Autologous Arterial Tissue, Open Approach
02130AC	Bypass Coronary Artery, Four or More Sites from Thoracic Artery with Autologous Arterial Tissue, Open Approach
02130AF	Bypass Coronary Artery, Four or More Sites from Abdominal Artery with Autologous Arterial Tissue, Open Approach
02130AW	Bypass Coronary Artery, Four or More Sites from Aorta with Autologous Arterial Tissue, Open Approach
02130J3	Bypass Coronary Artery, Four or More Sites from Coronary Artery with Synthetic Substitute, Open Approach
02130J8	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary with Synthetic Substitute, Open Approach
02130J9	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary with Synthetic Substitute, Open Approach
02130JC	Bypass Coronary Artery, Four or More Sites from Thoracic Artery with Synthetic Substitute, Open Approach
02130JF	Bypass Coronary Artery, Four or More Sites from Abdominal Artery with Synthetic Substitute, Open Approach
02130JW	Bypass Coronary Artery, Four or More Sites from Aorta with Synthetic Substitute, Open Approach
02130K3	Bypass Coronary Artery, Four or More Sites from Coronary Artery with Nonautologous Tissue Substitute, Open Approach
02130K8	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary with Nonautologous Tissue Substitute, Open Approach
02130K9	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary with Nonautologous Tissue Substitute, Open Approach
02130KC	Bypass Coronary Artery, Four or More Sites from Thoracic Artery with Nonautologous Tissue Substitute, Open Approach
02130KF	Bypass Coronary Artery, Four or More Sites from Abdominal Artery with Nonautologous Tissue Substitute, Open Approach
02130KW	Bypass Coronary Artery, Four or More Sites from Aorta with Nonautologous Tissue Substitute, Open Approach
02130Z3	Bypass Coronary Artery, Four or More Sites from Coronary Artery, Open Approach
02130Z8	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary, Open Approach
02130Z9	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary, Open Approach
02130ZC	Bypass Coronary Artery, Four or More Sites from Thoracic Artery, Open Approach
02130ZF	Bypass Coronary Artery, Four or More Sites from Abdominal Artery, Open Approach
0213493	Bypass Coronary Artery, Four or More Sites from Coronary Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
0213498	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary with Autologous Venous Tissue, Percutaneous Endoscopic Approach
0213499	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021349C	Bypass Coronary Artery, Four or More Sites from Thoracic Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021349F	Bypass Coronary Artery, Four or More Sites from Abdominal Artery with Autologous Venous Tissue, Percutaneous Endoscopic Approach
021349W	Bypass Coronary Artery, Four or More Sites from Aorta with Autologous Venous Tissue, Percutaneous Endoscopic Approach
02134A3	Bypass Coronary Artery, Four or More Sites from Coronary Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach

ICD-10 PCS codes for CABG procedures, cont'd

ICD-10 PCS Procedure Code	ICD-10 PCS Code Description
02134A8	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02134A9	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02134AC	Bypass Coronary Artery, Four or More Sites from Thoracic Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02134AF	Bypass Coronary Artery, Four or More Sites from Abdominal Artery with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02134AW	Bypass Coronary Artery, Four or More Sites from Aorta with Autologous Arterial Tissue, Percutaneous Endoscopic Approach
02134J3	Bypass Coronary Artery, Four or More Sites from Coronary Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02134J8	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary with Synthetic Substitute, Percutaneous Endoscopic Approach
02134J9	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary with Synthetic Substitute, Percutaneous Endoscopic Approach
02134JC	Bypass Coronary Artery, Four or More Sites from Thoracic Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02134JF	Bypass Coronary Artery, Four or More Sites from Abdominal Artery with Synthetic Substitute, Percutaneous Endoscopic Approach
02134JW	Bypass Coronary Artery, Four or More Sites from Aorta with Synthetic Substitute, Percutaneous Endoscopic Approach
02134K3	Bypass Coronary Artery, Four or More Sites from Coronary Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02134K8	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02134K9	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02134KC	Bypass Coronary Artery, Four or More Sites from Thoracic Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02134KF	Bypass Coronary Artery, Four or More Sites from Abdominal Artery with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02134KW	Bypass Coronary Artery, Four or More Sites from Aorta with Nonautologous Tissue Substitute, Percutaneous Endoscopic Approach
02134Z3	Bypass Coronary Artery, Four or More Sites from Coronary Artery, Percutaneous Endoscopic Approach
02134Z8	Bypass Coronary Artery, Four or More Sites from Right Internal Mammary, Percutaneous Endoscopic Approach
02134Z9	Bypass Coronary Artery, Four or More Sites from Left Internal Mammary, Percutaneous Endoscopic Approach
02134ZC	Bypass Coronary Artery, Four or More Sites from Thoracic Artery, Percutaneous Endoscopic Approach
02134ZF	Bypass Coronary Artery, Four or More Sites from Abdominal Artery, Percutaneous Endoscopic Approach

Physician CPT codes

Aortic valve procedures			
CPT® Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule Medicare National Unadjusted Amount ²
33361	Transcatheter aortic valve replacement (TAVR/TAVI) with prosthetic valve; percutaneous femoral artery approach	35.5	\$1,229
33362	Transcatheter aortic valve replacement (TAVR/TAVI) with prosthetic valve; open femoral artery approach	38.7	\$1,339
33363	Transcatheter aortic valve replacement (TAVR/TAVI) with prosthetic valve; open axillary artery approach	40.12	\$1,388
33364	Transcatheter aortic valve replacement (TAVR/TAVI) with prosthetic valve; open iliac artery approach	40.08	\$1,387
33365	Transcatheter aortic valve replacement (TAVR/TAVI) with prosthetic valve; transaortic approach (eg, median sternotomy, mediastinotomy)	41.86	\$1,449
33366	Transcatheter aortic valve replacement (TAVR/TAVI) with prosthetic valve; transapical exposure (eg, left thoractomy)	46.13	\$1,596
33367	Transcatheter aortic valve replacement (TAVR/TAVI) with prosthetic valve; cardiopulmonary bypass support with percutaneous peripheral arterial and venous cannulation (eg femoral vessels) (List separately in addition to code for primary procedure)	17.94	\$621
33368	Transcatheter aortic valve replacement (TAVR/TAVI) with prosthetic valve; cardiopulmonary bypass support with open peripheral arterial and venous cannulation (eg, femoral, iliac, axillary vessels) (List separately in addition to code for primary procedure)	21.74	\$752
33369	Transcatheter aortic valve replacement (TAVR/TAVI) with prosthetic valve; cardiopulmonary bypass support with central arterial and venous cannulation (eg, aorta, right atrium, pulmonary artery) (List separately in addition to code for primary procedure)	28.68	\$993
33390	Valvuloplasty, aortic valve, open with cardiopulmonary bypass; simple (eg, valvotomy, debridement, debulking, and/or simple commissural resuspension)	56.58	\$1,958
33391	Valvuloplasty, aortic valve, open with cardiopulmonary bypass; complex (eg, leaflet extension, leaflet resection, leaflet reconstruction, or annuloplasty)	67.27	\$2,328
33405	Replacement, aortic valve, with cardiopulmonary bypass; with prosthetic valve other than homograft or stentless valve	66.61	\$2,305
33406	"Replacement, aortic valve, with cardiopulmonary bypass; with allograft valve (freehand)"	84.31	\$2,918
33410	Replacement, aortic valve, with cardiopulmonary bypass; with stentless tissue valve	74.51	\$2,579
33411	Replacement, aortic valve; with aortic annulus enlargement, noncoronary cusp	98.35	\$3,404
33412	Replacement, aortic valve; with transventricular aortic annulus enlargement (Konno procedure)	92.30	\$3,194

All Medicare rates displayed in this table reflect the "national unadjusted" amounts inclusive of beneficiary cost-sharing and do not reflect any additional payment adjustments, such as the 2% sequester reduction mandated by the Budget Control Act of 2011 or the 4% PAYGO reduction triggered by the American Rescue Plan in December 2020. Please note that on December 10, 2021, legislation was enacted to delay the 2% sequestration for 3 months (January 1–March 31, 2022), followed by a reduction of 1% for 3 months (April 1–June 30, 2022). The full 2% sequestration cut will go back into effect on July 1, 2022. The 4% PAYGO reduction was postponed through January 1, 2023.

Index procedure codes 33361-33366 are paid at 62.5% of the fee schedule amount for each provider.

Aortic valve procedures, cont'd.

CPT [®] Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule Medicare National Unadjusted Amount ²
33413	Replacement, aortic valve; by translocation of autologous pulmonary valve with allograft replacement of pulmonary valve (Ross procedure)	94.57	\$3,273
33414	Repair of left ventricular outflow tract obstruction by patch enlargement of the outflow tract	62.95	\$2,178
33415	Resection or incision of subvalvular tissue for discrete subvalvular aortic stenosis	59.50	\$2,059
33416	Ventriculomyotomy (-myectomy) for idiopathic hypertrophic subaortic stenosis (eg, asymmetric septal hypertrophy)	59.35	\$2,054
33417	Aortoplasty (gusset) for supra-avalvular stenosis	48.97	\$1,695

Mitral valve procedures

CPT Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule ²
33418	Transcatheter mitral valve repair, percutaneous approach, including transseptal puncture when performed; initial prosthesis	52.83	\$1,828
33419	Transcatheter mitral valve repair, percutaneous approach, including transseptal puncture when performed; additional prosthesis(es) during same session (List separately in additiona to code for primary procedure)	12.44	\$431
33420	Valvotomy, mitral valve; closed heart	42.63	\$1,475
33422	Valvotomy, mitral valve; open heart, with cardiopulmonary bypass	48.87	\$1,691
33425	Valvuloplasty, mitral valve, with cardiopulmonary bypass	80.1	\$2,772
33426	Valvuloplasty, mitral valve, with cardiopulmonary bypass; with prosthetic ring	69.85	\$2,417
33427	Valvuloplasty, mitral valve, with cardiopulmonary bypass; radical reconstruction, with or without ring	71.49	\$2,474
33430	Replacement, mitral valve, with cardiopulmonary bypass	82.19	\$2,844

Tricuspid valve procedures

CPT Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule ²
33460	Valvectomy, tricuspid valve, with cardiopulmonary bypass	70.40	\$2,436
33463	Valvuloplasty, tricuspid valve; without ring insertion	90.04	\$3,116
33464	Valvuloplasty, tricuspid valve; with ring insertion	71.48	\$2,474
33465	Replacement, tricuspid valve, with cardiopulmonary bypass	80.72	\$2,793
33468	Tricuspid valve repositioning and plication for Ebstein anomaly	71.80	\$2,485

Pulmonary valve procedures

CPT Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule ²
33471	Valvotomy, pulmonary valve, closed heart; via pulmonary artery	38.91	\$1,347
33474	Valvotomy, pulmonary valve, open heart; with cardiopulmonary bypass	63.92	\$2,212
33475	Replacement, pulmonary valve	68.09	\$2,356
33476	Right ventricular resection for infundibular stenosis, with or without commissurotomy	44.74	\$1,548
33477	Transcatheter pulmonary valve implantation, percutaneous approach, including pre-stenting of the valve delivery site, when performed.	39.78	\$1,377
33478	Outflow tract augmentation (gusset), with or without commissurotomy or infundibular resection	46.21	\$1,599

Other valve procedures

CPT Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule ²
33496	Repair of non-structural prosthetic valve dysfunction with cardiopulmonary bypass (separate procedure)	48.92	\$1,693
33600	Closure of atrioventricular valve (mitral or tricuspid) by suture or patch	50.46	\$1,746
33602	Closure of semilunar valve (aortic or pulmonary) by suture or patch	48.99	\$1,695
33858	Ascending aorta graft, with cardiopulmonary bypass, includes valve suspension, when performed; for aortic dissection	99.49	\$3,443
33859	Ascending aorta graft, with cardiopulmonary bypass, includes valve suspension, when performed; for aortic disease other than dissection (eg, aneurysm)	71.50	\$2,474
33863	Ascending aorta graft, with cardiopulmonary bypass, with or without valve suspension; with aortic root replacement using composite prosthesis and coronary reconstruction	92.21	\$3,191
33864	Ascending aorta graft, with cardiopulmonary bypass with valve suspension, with coronary reconstruction and valve sparing aortic root remodeling (e.g., David procedure, Yacoub procedure)	94.35	\$3,265

Venous grafting only for coronary artery bypass

CPT Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule ²
33508	Endoscopy, surgical, including video-assisted harvest of vein(s) for coronary artery bypass procedure (List separately in addition to code for primary procedure)	0.48	\$17
33510	Coronary artery bypass, vein only; single coronary venous graft	56.78	\$1,965
33511	Coronary artery bypass, vein only; two coronary venous grafts	62.33	\$2,157
33512	Coronary artery bypass, vein only; three coronary venous grafts	71.07	\$2,459
33513	Coronary artery bypass, vein only; four coronary venous grafts	72.77	\$2,518
33514	Coronary artery bypass, vein only; five coronary venous grafts	76.57	\$2,650
33516	Coronary artery bypass, vein only; six or more coronary venous grafts	79.29	\$2,744

Combined arterial-venous grafting for coronary artery bypass

CPT Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule ²
33517	Coronary artery bypass, using venous graft(s) and arterial graft(s); single vein graft (List separately in addition to code for primary procedure)	5.5	\$190
33518	Coronary artery bypass, using venous graft(s) and arterial graft(s); two venous grafts (List separately in addition to code for primary procedure)	12.03	\$416
33519	Coronary artery bypass, using venous graft(s) and arterial graft(s); three venous grafts (List separately in addition to code for primary procedure)	15.94	\$552
33521	Coronary artery bypass, using venous graft(s) and arterial graft(s); four venous grafts (List separately in addition to code for primary procedure)	19.11	\$661
33522	Coronary artery bypass, using venous graft(s) and arterial graft(s); five venous grafts (List separately in addition to code for primary procedure)	21.45	\$742
33523	Coronary artery bypass, using venous graft(s) and arterial graft(s); six or more venous grafts (List separately in addition to code for primary procedure)	24.27	\$840

Arterial grafting for coronary artery bypass

CPT Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule ²
33509	Harvest of upper extremity artery, 1 segment, for coronary artery bypass procedure, endoscopic	5.07	\$175
33533	Coronary artery bypass, using arterial graft(s); single arterial graft	54.94	\$1,901
33534	Coronary artery bypass, using arterial graft(s); two coronary arterial grafts	64.49	\$2,232
33535	Coronary artery bypass, using arterial graft(s); three coronary arterial grafts	71.79	\$2,484
33536	Coronary artery bypass, using arterial graft(s); four or more coronary arterial grafts	77.32	\$2,676

Other CABG-related procedures

CPT Code	Code Description	2022	
		Facility RVUs ²	Physician Facility Fee Schedule ²
33530	Reoperation, coronary artery bypass procedure or valve procedure, more than one month after original operation (List separately in addition to code for primary procedure)	15.37	\$532
33542	Myocardial resection (eg, ventricular aneurysmectomy)	76.75	\$2,656
33545	Repair of postinfarction ventricular septal defect, with or without myocardial resection	90.01	\$3,115
33572	Coronary endarterectomy, open, any method, of left anterior descending, circumflex, or right coronary artery performed in conjunction with coronary artery bypass graft procedure, each vessel (List separately in addition to primary procedure)	76.75	\$233
33999	Unlisted procedure, cardiac surgery	Carrier priced ³	Carrier priced ³
35500	Harvest of upper extremity vein, one segment, for lower extremity or coronary artery bypass procedure (List separately in addition to code for primary procedure)	9.31	\$322
35600	Harvest of upper extremity artery, one segment, for coronary artery bypass procedure	5.47	\$189
93799	Unlisted cardiovascular service or procedure	Carrier priced ³	Carrier priced ³

Extracorporeal membrane oxygenation

CPT Code	Procedure Description	Facility RVUs ²	Physician Facility Fee Schedule ²
33946	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; initiation, veno-venous	9.08	\$314
33947	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; initiation, veno-arterial	10.04	\$347
33948	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; daily management, each day, veno-venous	6.98	\$242
33949	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; daily management, each day, veno-arterial	6.77	\$234
33951	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; insertion of peripheral (arterial and/or venous) cannula(e), percutaneous, birth through 5 years of age (includes fluoroscopic guidance, when performed)	12.41	\$429
33952	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; insertion of peripheral (arterial and/or venous) cannula(e), percutaneous, 6 years and older (includes fluoroscopic guidance, when performed)	12.53	\$434

Extracorporeal membrane oxygenation, cont'd.

CPT Code	Procedure Description	Facility RVUs ²	Physician Facility Fee Schedule ²
33953	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; insertion of peripheral (arterial and/or venous) cannula(e), open, birth through 5 years of age	13.88	\$480
33954	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; insertion of peripheral (arterial and/or venous) cannula(e), open, 6 years and older	13.99	\$484
33955	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; insertion of central cannula(e) by sternotomy or thoracotomy, birth through 5 years of age	24.25	\$839
33956	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; insertion of central cannula(e) by sternotomy or thoracotomy, 6 years and older	24.44	\$846
33957	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; reposition peripheral (arterial and/or venous) cannula(e), percutaneous, birth through 5 years of age (includes fluoroscopic guidance, when performed)	5.41	\$187
33958	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; reposition peripheral (arterial and/or venous) cannula(e), percutaneous, 6 years and older (includes fluoroscopic guidance, when performed)	5.41	\$187
33959	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; reposition peripheral (arterial and/or venous) cannula(e), open, birth through 5 years of age (includes fluoroscopic guidance, when performed)	6.85	\$237
33962	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; reposition peripheral (arterial and/or venous) cannula(e), open, 6 years and older (includes fluoroscopic guidance, when performed)	6.85	\$237
33963	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; reposition of central cannula(e) by sternotomy or thoracotomy, birth through 5 years of age (includes fluoroscopic guidance, when performed)	13.69	\$474
33964	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; reposition central cannula(e) by sternotomy or thoracotomy, 6 years and older (includes fluoroscopic guidance, when performed)	14.44	\$500
33965	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; removal of peripheral (arterial and/or venous) cannula(e), percutaneous, birth through 5 years of age	5.41	\$187
33966	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; removal of peripheral (arterial and/or venous) cannula(e), percutaneous, 6 years and older	6.92	\$239
33969	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; removal of peripheral (arterial and/or venous) cannula(e), open, birth through 5 years of age	7.97	\$276

Extracorporeal membrane oxygenation, cont'd.

CPT Code	Procedure Description	Facility RVUs ²	Physician Facility Fee Schedule ²
33984	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; removal of peripheral (arterial and/or venous) cannula(e), open, 6 years and older	8.31	\$288
33985	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; removal of central cannula(e) by sternotomy or thoracotomy, birth through 5 years of age	15.03	\$520
33986	Extracorporeal membrane oxygenation (ECMO)/extracorporeal life support (ECLS) provided by physician; removal of central cannula(e) by sternotomy or thoracotomy, 6 years and older	15.32	\$530

References

- ¹ CMS-1735 FY21 IPPS Final Rule Homepage. Available at: <https://www.cms.gov/medicare/acute-inpatient-pps/fy-2021-ipp-pps-final-rule-home-page#1735>. Accessed January 27, 2021.
- ² CMS CY 2022 Medicare Physician Fee Schedule Final Rule. Available at: <https://tinyurl.com/m2xcxy26>. Accessed November 23, 2021. All Medicare rates displayed in this table reflect the "national unadjusted" amounts inclusive of beneficiary cost-sharing and do not reflect any additional payment adjustments, such as the 2% sequester reduction mandated by the Budget Control Act of 2011 or the 4% PAYGO reduction triggered by the American Rescue Plan in December 2020. Please note that on December 10, 2021, legislation was enacted to delay the 2% sequestration for 3 months (January 1–March 31, 2022), followed by a reduction of 1% for 3 months (April 1–June 30, 2022). The full 2% sequestration cut will go back into effect on July 1, 2022. The 4% PAYGO reduction was postponed through January 1, 2023.
- ³ Carrier-priced code. Carriers will establish RVUs and payment amounts for these services, generally on a case-by-case basis following review of documentation, such as an operative report. 69 Fed. Reg. #219, November 15, 2004.

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