American College of Radiology
ACR Appropriateness Criteria®

Imaging of Ductal Carcinoma in Situ (DCIS)

Variant 1:   **Adult. Newly diagnosed DCIS. Initial imaging.**

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
							1	2	3	4	5	6	7	8	9
Mammography diagnostic	Usually appropriate	Strong	☢☢ 0.1-1mSv		9	9	0	0	0	0	1	0	0	2	11

References	Study Quality
52 (15486214)	3
48 (17693177)	2
47 (33242249)	1
45 (23963140)	Good
44 (30466027)	3
43 (27411945)	3
42 (14684521)	4
41 (8191988)	3
40 (15797293)	4
39 (23370209)	3
38 (8109501)	4
37 (2549563)	4
36 (23826951)	3
35 (2536185)	4
3 (23774990)	3
46 (25599513)	2

Digital breast tomosynthesis diagnostic	Usually appropriate	Strong	☢☢ 0.1-1mSv		9	9	0	0	0	0	1	0	0	1	12

References	Study Quality
48 (17693177)	2
47 (33242249)	1
46 (25599513)	2
45 (23963140)	Good
44 (30466027)	3
43 (27411945)	3
42 (14684521)	4
41 (8191988)	3
40 (15797293)	4
39 (23370209)	3
38 (8109501)	4
37 (2549563)	4
36 (23826951)	3
35 (2536185)	4
3 (23774990)	3

MRI breast without and with IV contrast	May be appropriate	Strong	O 0 mSv	O 0 mSv [ped]	6	6	1	0	0	1	4	3	2	2	1

References	Study Quality
73 (20217259)	3
72 (19375068)	4
71 (25919321)	Good
70 (17443388)	3
69 (22517955)	3
68 (12734086)	3
67 (34342501)	1
66 (20956821)	4
65 (19864520)	4
64 (9377507)	4

References	Study Quality
63 (18024450)	3
62 (17983393)	3
61 (9015067)	4
60 (24108552)	4
59 (29139591)	3
58 (28750354)	2
48 (17693177)	2

US breast	May be appropriate	Strong	O 0 mSv	O 0 mSv [ped]	5	5	0	0	0	4	7	2	1	0	0

References	Study Quality
84 (33589308)	2
83 (26962097)	1
82 (19575283)	4
81 (34794600)	4
79 (28242086)	4
78 (-3196796)	4
77 (23949917)	3
61 (9015067)	4
52 (15486214)	3
35 (2536185)	4
80 (-3196797)	4

Mammography with IV contrast	Usually not appropriate	Strong	☢☢ 0.1-1mSv		2	2	6	4	2	1	1	0	0	0	0

References	Study Quality
58 (28750354)	2
57 (27345656)	2
56 (30678480)	2
55 (27611215)	3
54 (-3196794)	3
53 (34503181)	3

Procedure	Appropriateness	Evidence	Adult RRL	Pediatric RRL											
CT chest with IV contrast	Usually not appropriate	Limited	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0

References	Study Quality
34 (-3196793)	4

Procedure	Appropriateness	Evidence	Adult RRL	Pediatric RRL											
CT chest without IV contrast	Usually not appropriate	Limited	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0

References	Study Quality
34 (-3196793)	4

Procedure	Appropriateness	Evidence	Adult RRL	Pediatric RRL											
CT chest without and with IV contrast	Usually not appropriate	Limited	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0

References	Study Quality
34 (-3196793)	4

Procedure	Appropriateness	Evidence	Adult RRL	Pediatric RRL											
MRI breast without IV contrast	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
FDG-PET breast dedicated	Usually not appropriate	Strong	☢☢☢ 1-10 mSv		1	1	11	1	2	0	0	0	0	0	0

References	Study Quality
51 (31375867)	2
50 (28870933)	4
49 (11032590)	2
34 (-3196793)	4

Procedure	Appropriateness	Evidence	Adult RRL	Pediatric RRL											
Sestamibi MBI	Usually not appropriate	Moderate	☢☢☢ 1-10 mSv		1	1	8	1	3	1	1	0	0	0	0

References	Study Quality
76 (31166752)	3
75 (22911882)	4
74 (23151912)	Good

Variant 2:   Adult. Newly diagnosed DCIS. No surgical intervention. Active surveillance.

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
							1	2	3	4	5	6	7	8	9
Digital breast tomosynthesis diagnostic	Usually appropriate	Moderate	☢☢ 0.1-1mSv		9	9	0	0	0	0	1	0	4	2	7

References	Study Quality
86 (28705686)	4
87 (-3196799)	2

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
Mammography diagnostic	Usually appropriate	Moderate	☢☢ 0.1-1mSv		8	8	0	0	1	0	0	0	6	0	7

References	Study Quality
88 (32125937)	3
87 (-3196799)	2
86 (28705686)	4

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
MRI breast without and with IV contrast	May be appropriate	Strong	O 0 mSv	O 0 mSv [ped]	5	5	0	0	0	2	6	1	2	3	0

References	Study Quality
88 (32125937)	3
87 (-3196799)	2
71 (25919321)	Good
70 (17443388)	3
68 (12734086)	3
67 (34342501)	1
58 (28750354)	2

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
Mammography with IV contrast	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		2	2	7	4	3	0	0	0	0	0	0
CT chest with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	1	2	3	4	5	6	7	8	9
CT chest without and with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
MRI breast without IV contrast	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
FDG-PET breast dedicated	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv		1	1	13	0	1	0	0	0	0	0	0
US breast	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	10	2	1	1	0	0	0	0	0
Sestamibi MBI	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv		1	1	12	1	1	0	0	0	0	0	0

Variant 3:   Adult. Evaluation for local recurrence in patient with history of breast conservation therapy for DCIS. Routine surveillance.

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
							1	2	3	4	5	6	7	8	9
Mammography screening	Usually appropriate	Limited	☢☢ 0.1-1mSv		9	9	1	0	0	0	0	0	1	2	10

References	Study Quality
113 (22692036)	3
111 (32529566)	3
110 (27163158)	3
109 (31313678)	3
108 (29064749)	4
107 (-3196801)	4
106 (20956827)	4
105 (29748762)	3
104 (25904721)	3
103 (24106867)	3
102 (24113745)	3
101 (28675577)	4

References	Study Quality
100 (23129741)	4
99 (36436961)	4
90 (9016233)	4
89 (17579163)	3
27 (-3196789)	4

Digital breast tomosynthesis diagnostic	Usually appropriate	Limited	☢☢ 0.1-1mSv		9	9	0	0	0	0	3	0	0	4	7

References	Study Quality
108 (29064749)	4
107 (-3196801)	4
106 (20956827)	4
105 (29748762)	3
104 (25904721)	3
103 (24106867)	3
102 (24113745)	3
101 (28675577)	4
100 (23129741)	4
99 (36436961)	4
90 (9016233)	4
89 (17579163)	3
27 (-3196789)	4

Digital breast tomosynthesis screening	Usually appropriate	Limited	☢☢ 0.1-1mSv		9	9	1	0	0	0	0	0	1	1	11

References	Study Quality
111 (32529566)	3
110 (27163158)	3
109 (31313678)	3
108 (29064749)	4
107 (-3196801)	4
106 (20956827)	4
105 (29748762)	3

References	Study Quality
104 (25904721)	3
103 (24106867)	3
102 (24113745)	3
101 (28675577)	4
100 (23129741)	4
99 (36436961)	4
90 (9016233)	4
89 (17579163)	3
27 (-3196789)	4

Mammography diagnostic	Usually appropriate	Strong	☢☢ 0.1-1mSv		8	8	0	0	1	0	2	0	0	5	6

References	Study Quality
113 (22692036)	3
112 (8511295)	2
111 (32529566)	3
110 (27163158)	3
109 (31313678)	3
108 (29064749)	4
107 (-3196801)	4
106 (20956827)	4
105 (29748762)	3
104 (25904721)	3
103 (24106867)	3
102 (24113745)	3
101 (28675577)	4
100 (23129741)	4
99 (36436961)	4
90 (9016233)	4
89 (17579163)	3
27 (-3196789)	4

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	1	2	3	4	5	6	7	8	9
MRI breast without and with IV contrast	May be appropriate (Disagreement)	Expert Opinion	☢ 0 mSv	☢ 0 mSv [ped]	5	5	0	0	0	4	6	0	2	2	0

	References	Study Quality
	114 (-3196807)	4

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	1	2	3	4	5	6	7	8	9
US breast	Usually not appropriate	Expert Consensus	☢ 0 mSv	☢ 0 mSv [ped]	2	2	7	5	1	0	1	0	0	0	0
Mammography with IV contrast	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		2	2	3	6	4	0	1	0	0	0	0
CT chest with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without and with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
MRI breast without IV contrast	Usually not appropriate	Expert Consensus	☢ 0 mSv	☢ 0 mSv [ped]	1	1	13	1	0	0	0	0	0	0	0
FDG-PET breast dedicated	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv		1	1	13	0	0	0	1	0	0	0	0
Sestamibi MBI	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv		1	1	11	0	1	0	2	0	0	0	0

Variant 4:   Adult. Evaluation for ipsilateral local recurrence in a patient with history of mastectomy for DCIS. Routine surveillance.

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
							1	2	3	4	5	6	7	8	9
CT chest with IV contrast	Usually not appropriate	Limited	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0

	References	Study Quality

		References													
		122 (-3196805)		4											
		121 (-3196803)		4											
		100 (23129741)		4											
CT chest without IV contrast	Usually not appropriate	Limited	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
		References		Study Quality											
		122 (-3196805)		4											
		121 (-3196803)		4											
		100 (23129741)		4											
CT chest without and with IV contrast	Usually not appropriate	Limited	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
		References		Study Quality											
		122 (-3196805)		4											
		121 (-3196803)		4											
		100 (23129741)		4											
Mammography screening	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	12	2	0	0	0	0	0	0	0
MRI breast without IV contrast	Usually not appropriate	Limited	O 0 mSv	O 0 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
		References		Study Quality											
		122 (-3196805)		4											
		121 (-3196803)		4											
		100 (23129741)		4											
MRI breast without and with IV contrast	Usually not appropriate	Limited	O 0 mSv	O 0 mSv [ped]	1	1	10	3	0	1	0	0	0	0	0
		References		Study Quality											
		123 (32374666)		4											
		114 (-3196807)		4											
		122 (-3196805)		4											
		121 (-3196803)		4											

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	1	2	3	4	5	6	7	8	9
		References		100 (23129741)		Study Quality 4									
FDG-PET breast dedicated	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv		1	1	13	0	1	0	0	0	0	0	0
US breast	Usually not appropriate	Limited	O 0 mSv	O 0 mSv [ped]	1	1	11	2	0	1	0	0	0	0	0
		References		124 (23131395)		Study Quality 3									
Digital breast tomosynthesis screening	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	12	2	0	0	0	0	0	0	0
Sestamibi MBI	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv		1	1	13	0	0	0	1	0	0	0	0
Mammography with IV contrast	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	12	0	0	0	1	0	0	0	1

Variant 5:   Adult. Suspected local recurrence based on symptoms, physical examination, or laboratory value in patient with history of breast conservation therapy for DCIS. Initial imaging.

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
							1	2	3	4	5	6	7	8	9
Mammography diagnostic	Usually appropriate	Limited	☢☢ 0.1-1mSv		9	9	0	0	0	0	0	0	0	3	11
		References				Study Quality									
		128 (21833567)				4									
		126 (30392596)				4									
		125 (28473077)				4									
Digital breast tomosynthesis diagnostic	Usually appropriate	Strong	☢☢ 0.1-1mSv		9	9	0	0	0	0	0	0	1	1	12
		References				Study Quality									
		126 (30392596)				4									
		125 (28473077)				4									

	45 (23963140)		**Good**											
	44 (30466027)		3											
	43 (27411945)		3											
	42 (14684521)		4											
	36 (23826951)		3											
US breast	Usually appropriate	Limited	O 0 mSv	O 0 mSv [ped]	8	8	0	0	0	0	1	0	3	4	6
	References		**Study Quality**											
	128 (21833567)		4											
Mammography with IV contrast	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		3	3	3	2	3	1	4	0	1	0	0
MRI breast without and with IV contrast	Usually not appropriate	Strong	O 0 mSv	O 0 mSv [ped]	2	2	7	4	3	0	0	0	0	0	0
	References		**Study Quality**											
	131 (32108973)		4											
	130 (23046046)		3											
	129 (28754486)		3											
	59 (29139591)		3											
	58 (28750354)		2											
CT chest with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without and with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
Image-guided core biopsy breast	Usually not appropriate	Limited	Varies	Varies	1	1	13	1	0	0	0	0	0	0	0
	References		**Study Quality**											
	127 (22039282)		4											

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	1	2	3	4	5	6	7	8	9
Image-guided fine needle aspiration breast	Usually not appropriate	Limited	Varies	Varies	1	1	10	1	1	0	1	0	0	0	1

	References		Study Quality			
	127 (22039282)		4	

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	1	2	3	4	5	6	7	8	9
MRI breast without IV contrast	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
FDG-PET breast dedicated	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv		1	1	12	0	1	0	1	0	0	0	0
Sestamibi MBI	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv		1	1	12	0	1	0	0	1	0	0	0

Variant 6: Adult. Suspected local recurrence based on symptoms, physical examination, or laboratory value in patient with history of mastectomy for DCIS. Initial imaging.

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
							1	2	3	4	5	6	7	8	9
US breast	Usually appropriate	Limited	O 0 mSv	O 0 mSv [ped]	9	9	0	0	0	0	0	0	4	3	7

	References		Study Quality	
	126 (30392596)		4	
	125 (28473077)		4	

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	1	2	3	4	5	6	7	8	9
MRI breast without and with IV contrast	Usually not appropriate	Limited	O 0 mSv	O 0 mSv [ped]	2	2	7	1	4	0	0	1	1	0	0

	References		Study Quality	
	131 (32108973)		4	
	130 (23046046)		3	
	129 (28754486)		3	

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	1	2	3	4	5	6	7	8	9
CT chest with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	13	0	0	0	1	0	0	0	0

Procedure	Appropriateness Category	Evidence Category	Adult RRL	Pediatric RRL										
CT chest without IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without and with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	13	0	0	0	1	0	0	0	0
Mammography diagnostic	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	10	2	1	1	0	0	0	0	0
MRI breast without IV contrast	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
FDG-PET/CT skull base to mid-thigh	Usually not appropriate	Expert Consensus	☢☢☢☢ 10-30 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	13	0	0	0	0	0	0	0	1
Digital breast tomosynthesis diagnostic	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	10	2	2	0	0	0	0	0	0
Mammography with IV contrast	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	10	2	1	0	1	0	0	0	0
Image-guided fine needle aspiration chest	Usually not appropriate	Moderate	Varies	Varies	1	1	10	0	1	0	1	1	0	0	1

References	Study Quality
133 (22088803)	3
132 (27866091)	Good

Procedure	Appropriateness Category	Evidence Category	Adult RRL	Pediatric RRL										
Image-guided biopsy chest	Usually not appropriate	Moderate	Varies	Varies	1	1	13	0	1	0	0	0	0	0	0

References	Study Quality
133 (22088803)	3
132 (27866091)	Good

Variant 7:   Adult. Known DCIS with microinvasion found on prior mammography, ultrasound, or MRI during initial evaluation. Axillary evaluation needed. Next imaging study.

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
							1	2	3	4	5	6	7	8	9
CT chest with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without and with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
MRI breast without IV contrast	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
MRI breast without and with IV contrast	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	11	0	1	1	0	0	1	0	0
FDG-PET/CT whole body	Usually not appropriate	Expert Consensus	☢☢☢☢ 10-30 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
Digital breast tomosynthesis diagnostic	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	14	0	0	0	0	0	0	0	0
US axilla	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	8	4	2	0	0	0	0	0	0
US-guided fine needle aspiration biopsy axillary node	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	10	2	0	1	0	0	0	0	1
US-guided core biopsy axillary node	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	9	3	0	1	0	0	0	0	1
Mammography with IV contrast	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	13	1	0	0	0	0	0	0	0
Lymphoscintigraphy axilla	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	10	1	1	0	1	1	0	0	0

Variant 8: **Adult. Known DCIS without microinvasion found on prior mammography, ultrasound, or MRI during initial evaluation. Axillary evaluation needed. Next imaging study.**

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
							1	2	3	4	5	6	7	8	9
CT chest with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
CT chest without and with IV contrast	Usually not appropriate	Expert Consensus	☢☢☢ 1-10 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
MRI breast without IV contrast	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
MRI breast without and with IV contrast	Usually not appropriate	Limited	O 0 mSv	O 0 mSv [ped]	1	1	12	1	1	0	0	0	0	0	0

References	Study Quality
139 (34470633)	3

Procedure	Appropriateness Category	SOE	Adults RRL	Peds RRL	Rating	Median	Final Tabulations								
FDG-PET/CT whole body	Usually not appropriate	Expert Consensus	☢☢☢☢ 10-30 mSv	☢☢☢☢ 3-10 mSv [ped]	1	1	14	0	0	0	0	0	0	0	0
Digital breast tomosynthesis diagnostic	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	13	1	0	0	0	0	0	0	0
US axilla	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	10	0	2	1	0	0	0	0	1
US-guided fine needle aspiration biopsy axillary node	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	12	1	0	0	0	0	0	0	1
US-guided core biopsy axillary node	Usually not appropriate	Expert Consensus	O 0 mSv	O 0 mSv [ped]	1	1	12	1	0	0	0	0	0	0	1

Mammography with IV contrast	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	14	0	0	0	0	0	0	0	0
Lymphoscintigraphy axilla	Usually not appropriate	Expert Consensus	☢☢ 0.1-1mSv		1	1	11	0	1	0	2	0	0	0	0

Appendix Key

A more complete discussion of the items presented below can be found by accessing the supporting documents at the designated hyperlinks.

Appropriateness Category: The panel's recommendation for a procedure based on the assessment of the risks and benefits of performing the procedure for the specified clinical scenario.

SOE: Strength of Evidence. The assessment of the amount and quality of evidence found in the peer reviewed medical literature for an appropriateness recommendation.

- **References:** The citation number and PMID for the reference(s) associated with the recommendation.
- **Study Quality**: The assessment of the quality of an individual reference based on the number of study quality elements described in the reference.

RRL: Relative Radiation Level. A population based assessment of the amount of radiation a typical patient may be exposed to during the specified procedure.

Rating: The final rating (1-9 scale) for the procedure as determined by the panel during rating rounds.

Median: The median rating (1-9 scale) for the procedure as determined by the panel during rating rounds.

Final tabulations: A histogram showing the number of panel members who rated the procedure as noted in the column heading (ie, 1, 2, 3, etc.).

Additional supporting documents about the AC methodology and processes can be found at **www.acr.org/ac.**