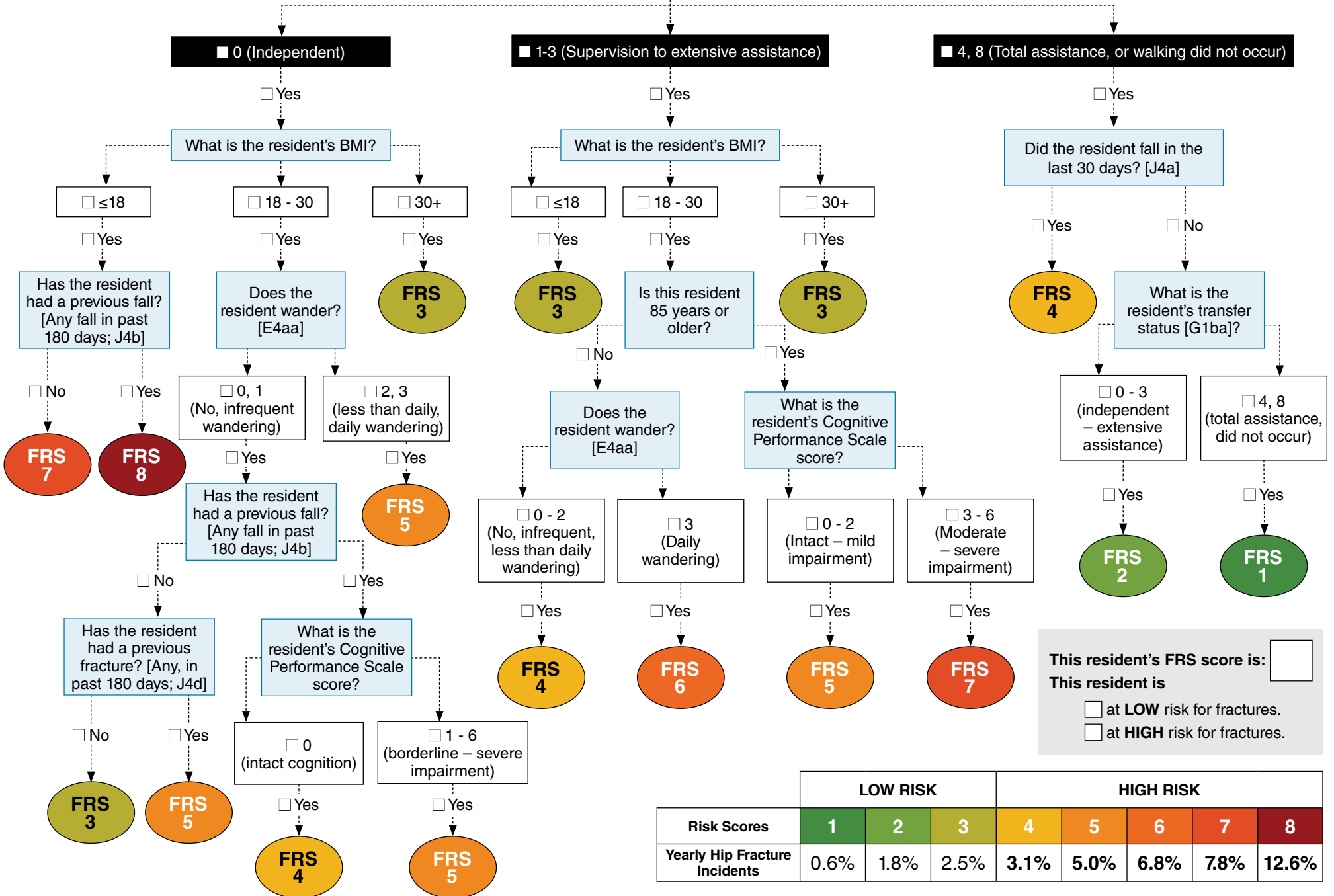


**Instructions:** Using information from the resident's latest RAI-MDS assessment, respond to questions to direct you to the resident's Fracture Risk Scale Score (MDS response locations appear in square brackets, where applicable). Document the responses using the check boxes. Instructions for calculating BMI are presented on the back side.

# Fracture Risk Scale: Manual Score Calculation

**START HERE** > What is the resident's ability to walk in the corridor score? [G1da]

Resident: \_\_\_\_\_ Date: \_\_\_\_\_



This resident's FRS score is:

This resident is

- at **LOW** risk for fractures.
- at **HIGH** risk for fractures.

	LOW RISK			HIGH RISK				
Risk Scores	1	2	3	4	5	6	7	8
Yearly Hip Fracture Incidents	0.6%	1.8%	2.5%	3.1%	5.0%	6.8%	7.8%	12.6%

## How to find BMI: Locate where the resident's height and weight intersect; BMI is listed in the square

		WEIGHT																					
		lbs	90	100	110	120	130	140	150	160	170	180	190	200	210	220	230	240	250	260	270	280	290
		kgs	41	45	50	54	59	64	68	73	77	82	86	91	95	100	104	109	113	118	122	127	132
HEIGHT	ft/in	cm																					
	4'8"	142.2	20	22	25	27	29	31	34	36	38	40	43	45	47	49	52	54	56	58	61	63	65
4'9"	144.7	19	22	24	26	28	30	32	35	37	39	41	43	45	48	50	52	54	56	58	61	63	
4'10"	147.3	19	21	23	25	27	29	31	33	36	38	40	42	44	46	48	50	52	54	56	59	61	
4'11"	149.8	18	20	22	24	26	28	30	32	34	36	38	40	42	44	46	48	51	53	55	57	59	
5'0"	152.4	18	20	21	23	25	27	29	31	33	35	37	39	41	43	45	47	49	51	53	55	57	
5'1"	154.9	17	19	21	23	25	26	28	30	32	34	36	38	40	42	43	45	47	49	51	53	55	
5'2"	157.4	16	18	20	22	24	26	27	29	31	33	35	37	38	40	42	44	46	48	49	51	53	
5'3"	160.0	16	18	19	21	23	25	27	28	30	32	34	35	37	39	41	43	44	46	48	50	51	
5'4"	162.5	15	17	19	21	22	24	26	27	29	31	33	34	36	38	39	41	43	45	46	48	50	
5'5"	165.1	15	17	18	20	22	23	25	27	28	30	32	33	35	37	38	40	42	43	45	47	48	
5'6"	167.6	15	16	18	19	21	23	24	26	27	29	31	32	34	36	37	39	40	42	44	45	47	
5'7"	170.1	14	16	17	19	20	22	24	25	27	28	30	31	33	34	36	38	39	41	42	44	45	
5'8"	172.7	14	15	17	18	20	21	23	24	26	27	29	30	32	33	35	37	38	40	41	43	44	
5'9"	175.2	13	15	16	18	19	21	22	24	25	27	28	30	31	33	34	35	37	38	40	41	43	
5'10"	177.8	13	14	16	17	19	20	22	23	24	26	27	29	30	32	33	34	36	37	39	40	42	
5'11"	180.3	13	14	15	17	18	20	21	22	24	25	27	28	29	31	32	33	35	36	38	39	40	
6'0"	182.8	12	14	15	16	18	19	20	22	23	24	26	27	28	30	31	33	34	35	37	38	39	
6'1"	185.4	12	13	15	16	17	18	20	21	22	24	25	26	28	29	30	32	33	34	36	37	38	
6'2"	187.9	12	13	14	15	17	18	19	21	22	23	24	26	27	28	30	31	32	33	35	36	37	
6'3"	190.5	11	13	14	15	16	18	19	20	21	23	24	25	26	28	29	30	31	33	34	35	36	
6'4"	193.0	11	12	13	15	16	17	18	19	21	22	23	24	26	27	28	29	30	32	33	34	35	
6'5"	195.5	11	12	13	14	15	17	18	19	20	21	23	24	25	26	27	28	30	31	32	33	34	
6'6"	198.1	10	12	13	14	15	16	17	18	20	21	22	23	24	25	27	28	29	30	31	32	34	
6'7"	200.6	10	11	12	14	15	16	17	18	19	20	21	23	24	25	26	27	28	29	30	32	33	
6'8"	203.2	10	11	12	13	14	15	16	18	19	20	21	22	23	24	25	26	27	29	30	31	32	
6'9"	205.7	10	11	12	13	14	15	16	17	18	19	20	21	24	24	25	26	27	28	29	30	31	
6'10"	208.2	9	10	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	
6'11"	210.8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	25	26	27	28	29	30	
			BMI<18 - High fracture risk for residents who walk independently										BMI 18 – 30 low – high risk dependent on the presence of other risk factors						BMI 30+ low risk				

### Online BMI Calculators:

<https://bmicalculatorcanada.com/>

<https://www.calculator.net/bmi-calculator.html>

[https://www.cdc.gov/healthyweight/assessing/bmi/adult\\_bmi/english\\_bmi\\_calculator/bmi\\_calculator.html](https://www.cdc.gov/healthyweight/assessing/bmi/adult_bmi/english_bmi_calculator/bmi_calculator.html)

Adapted from <https://bmicalculatorcanada.com>

Papaioannou et al. Recommendations for preventing fracture in long-term care. CMAJ 2015 187(15), 1135–1144.

Ioannidis et al. Development and validation of the Fracture Risk Scale (FRS) that predicts fracture over a 1-year time period in institutionalized frail older people living in Canada: an electronic record-linked longitudinal cohort study. BMJ Open 2017;7:e016477.

McArthur et al. Developing a Fracture Risk Clinical Assessment Protocol for Long-Term Care: A Modified Delphi Consensus Process, JAMDA, Sep 20, 2020 (e-pub ahead of print).



Treatment Considerations								Considerations for medication use	
LOW RISK			HIGH RISK						
1	2	3	4	5	6	7	8		
<ul style="list-style-type: none"> <li>• <b>Vitamin D:</b> 800-2000IU</li> <li>• <b>Calcium:</b> 1200mg (daily total diet &amp; supplement)</li> <li>• <b>Exercise:</b> functional strength &amp; balance</li> </ul>			<ul style="list-style-type: none"> <li>• <b>Vitamin D:</b> 800-2000IU</li> <li>• <b>Calcium:</b> 1200mg (daily total diet &amp; supplement)</li> <li>• <b>Exercise:</b> functional strength &amp; balance</li> <li>• <b>Osteoporosis medications</b></li> <li>• <b>Hip protectors</b></li> </ul>					<ul style="list-style-type: none"> <li>• Fracture risk – residents at high risk should be treated</li> <li>• Residents' preferences and goals for care</li> <li>• Life expectancy (&gt; 1 year)</li> <li>• Kidney function (creatinine clearance)</li> <li>• Swallowing issues (dysphagia)</li> </ul>	