

HW1.7. Identify the rotation matrices

Identify all of the rotation matrices (assume that a matrix is a rotation matrix if it satisfies all constraints to within 4 digits after the decimal).

Python

```
import numpy as np

R1 = np.array([[ -0.77024132, -0.14033269,
-0.38738381], [0.61011880, -0.16165521,
-0.92023218], [ -0.00295929, -0.93107159,
0.13346234]])
R2 = np.array([[0.08029011, -0.02844769,
0.99636551], [ -0.34187259, 0.93817418,
0.05433536], [ -0.93631011, -0.34499265,
0.06560062]])
R3 = np.array([[ -0.99335088, -0.08152602,
-0.08128677], [ -0.03207613, -0.48211873,
0.87551851], [ -0.11056741, 0.87230444,
0.47629802]])
R4 = np.array([[0.23962260, 0.63774551,
0.82597111], [0.79509920, -0.29210746,
-0.44486516], [0.20872444, 0.80072031,
-0.32033480]])
R5 = np.array([[ -0.26370186, 0.51366259,
-0.81646315], [0.88564120, 0.46433038,
0.00607978], [0.38223160, -0.72149015,
-0.57736554]])
```

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- ☐ (a) R_1
- ☐ (b) R_2
- ☐ (c) R_3
- ☐ (d) R_4
- ☐ (e) R_5

Select all possible options that apply. ?

Homework 1

Assessment
overview

Total 30/30
points:

Score: 100%

Question

Value: 1

History: 1
1

Awarded points: 1/1

Report an error in
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Previous
question

Next question

Attached
files

No attached
files

Attach a file

Attach text

Save & Grade
Single attempt

Save
only

*Additional attempts available
with new variants*

