**Corrosion Resistance Neural Network and Mean Squared Error Results**

**TRIAL ONE :**

runfile('C:/Users/Shrishti D Hore/OneDrive/Documents/Stir\_Research/Folder/Stir\_Research\_Corrosion\_Resistance\_NN\_and\_mean\_squared\_error.py', wdir='C:/Users/Shrishti D Hore/OneDrive/Documents/Stir\_Research/Folder')

C:\Users\Shrishti D Hore\Miniconda3\envs\shripy\lib\site-packages\sklearn\utils\validation.py:595: DataConversionWarning: Data with input dtype int64 was converted to float64 by StandardScaler.

warnings.warn(msg, DataConversionWarning)

C:\Users\Shrishti D Hore\Miniconda3\envs\shripy\lib\site-packages\sklearn\utils\validation.py:595: DataConversionWarning: Data with input dtype int64 was converted to float64 by StandardScaler.

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warnings.warn(msg, DataConversionWarning)

C:\Users\Shrishti D Hore\Miniconda3\envs\shripy\lib\site-packages\sklearn\utils\validation.py:595: DataConversionWarning: Data with input dtype int64 was converted to float64 by StandardScaler.

warnings.warn(msg, DataConversionWarning)

Train on 22 samples, validate on 8 samples

Epoch 1/100

22/22 [==============================] - 3s 131ms/step - loss: 1.0716 - mean\_squared\_error: 1.0716 - val\_loss: 1.8880 - val\_mean\_squared\_error: 1.8880

Epoch 2/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0690 - mean\_squared\_error: 1.0690 - val\_loss: 1.8821 - val\_mean\_squared\_error: 1.8821

Epoch 3/100

22/22 [==============================] - 0s 1ms/step - loss: 1.0676 - mean\_squared\_error: 1.0676 - val\_loss: 1.8762 - val\_mean\_squared\_error: 1.8762

Epoch 4/100

22/22 [==============================] - 0s 5ms/step - loss: 1.0661 - mean\_squared\_error: 1.0661 - val\_loss: 1.8717 - val\_mean\_squared\_error: 1.8717

Epoch 5/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0645 - mean\_squared\_error: 1.0645 - val\_loss: 1.8672 - val\_mean\_squared\_error: 1.8672

Epoch 6/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0633 - mean\_squared\_error: 1.0633 - val\_loss: 1.8628 - val\_mean\_squared\_error: 1.8628

Epoch 7/100

22/22 [==============================] - 0s 788us/step - loss: 1.0622 - mean\_squared\_error: 1.0622 - val\_loss: 1.8595 - val\_mean\_squared\_error: 1.8595

Epoch 8/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0609 - mean\_squared\_error: 1.0609 - val\_loss: 1.8577 - val\_mean\_squared\_error: 1.8577

Epoch 9/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0601 - mean\_squared\_error: 1.0601 - val\_loss: 1.8569 - val\_mean\_squared\_error: 1.8569

Epoch 10/100

22/22 [==============================] - 0s 5ms/step - loss: 1.0593 - mean\_squared\_error: 1.0593 - val\_loss: 1.8554 - val\_mean\_squared\_error: 1.8554

Epoch 11/100

22/22 [==============================] - 0s 1ms/step - loss: 1.0586 - mean\_squared\_error: 1.0586 - val\_loss: 1.8532 - val\_mean\_squared\_error: 1.8532

Epoch 12/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0577 - mean\_squared\_error: 1.0577 - val\_loss: 1.8506 - val\_mean\_squared\_error: 1.8506

Epoch 13/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0565 - mean\_squared\_error: 1.0565 - val\_loss: 1.8475 - val\_mean\_squared\_error: 1.8475

Epoch 14/100

22/22 [==============================] - 0s 772us/step - loss: 1.0554 - mean\_squared\_error: 1.0554 - val\_loss: 1.8432 - val\_mean\_squared\_error: 1.8432

Epoch 15/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0542 - mean\_squared\_error: 1.0542 - val\_loss: 1.8393 - val\_mean\_squared\_error: 1.8393

Epoch 16/100

22/22 [==============================] - 0s 930us/step - loss: 1.0531 - mean\_squared\_error: 1.0531 - val\_loss: 1.8357 - val\_mean\_squared\_error: 1.8357

Epoch 17/100

22/22 [==============================] - 0s 1ms/step - loss: 1.0519 - mean\_squared\_error: 1.0519 - val\_loss: 1.8323 - val\_mean\_squared\_error: 1.8323

Epoch 18/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0508 - mean\_squared\_error: 1.0508 - val\_loss: 1.8283 - val\_mean\_squared\_error: 1.8283

Epoch 19/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0500 - mean\_squared\_error: 1.0500 - val\_loss: 1.8240 - val\_mean\_squared\_error: 1.8240

Epoch 20/100

22/22 [==============================] - 0s 7ms/step - loss: 1.0486 - mean\_squared\_error: 1.0486 - val\_loss: 1.8198 - val\_mean\_squared\_error: 1.8198

Epoch 21/100

22/22 [==============================] - 0s 4ms/step - loss: 1.0476 - mean\_squared\_error: 1.0476 - val\_loss: 1.8155 - val\_mean\_squared\_error: 1.8155

Epoch 22/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0467 - mean\_squared\_error: 1.0467 - val\_loss: 1.8112 - val\_mean\_squared\_error: 1.8112

Epoch 23/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0454 - mean\_squared\_error: 1.0454 - val\_loss: 1.8078 - val\_mean\_squared\_error: 1.8078

Epoch 24/100

22/22 [==============================] - 0s 602us/step - loss: 1.0445 - mean\_squared\_error: 1.0445 - val\_loss: 1.8040 - val\_mean\_squared\_error: 1.8040

Epoch 25/100

22/22 [==============================] - 0s 7ms/step - loss: 1.0431 - mean\_squared\_error: 1.0431 - val\_loss: 1.8000 - val\_mean\_squared\_error: 1.8000

Epoch 26/100

22/22 [==============================] - 0s 973us/step - loss: 1.0424 - mean\_squared\_error: 1.0424 - val\_loss: 1.7939 - val\_mean\_squared\_error: 1.7939

Epoch 27/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0406 - mean\_squared\_error: 1.0406 - val\_loss: 1.7881 - val\_mean\_squared\_error: 1.7881

Epoch 28/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0394 - mean\_squared\_error: 1.0394 - val\_loss: 1.7820 - val\_mean\_squared\_error: 1.7820

Epoch 29/100

22/22 [==============================] - 0s 8ms/step - loss: 1.0381 - mean\_squared\_error: 1.0381 - val\_loss: 1.7767 - val\_mean\_squared\_error: 1.7767

Epoch 30/100

22/22 [==============================] - 0s 1ms/step - loss: 1.0371 - mean\_squared\_error: 1.0371 - val\_loss: 1.7712 - val\_mean\_squared\_error: 1.7712

Epoch 31/100

22/22 [==============================] - 0s 809us/step - loss: 1.0356 - mean\_squared\_error: 1.0356 - val\_loss: 1.7659 - val\_mean\_squared\_error: 1.7659

Epoch 32/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0343 - mean\_squared\_error: 1.0343 - val\_loss: 1.7605 - val\_mean\_squared\_error: 1.7605

Epoch 33/100

22/22 [==============================] - 0s 1ms/step - loss: 1.0331 - mean\_squared\_error: 1.0331 - val\_loss: 1.7554 - val\_mean\_squared\_error: 1.7554

Epoch 34/100

22/22 [==============================] - 0s 4ms/step - loss: 1.0318 - mean\_squared\_error: 1.0318 - val\_loss: 1.7510 - val\_mean\_squared\_error: 1.7510

Epoch 35/100

22/22 [==============================] - 0s 5ms/step - loss: 1.0307 - mean\_squared\_error: 1.0307 - val\_loss: 1.7480 - val\_mean\_squared\_error: 1.7480

Epoch 36/100

22/22 [==============================] - 0s 1ms/step - loss: 1.0299 - mean\_squared\_error: 1.0299 - val\_loss: 1.7456 - val\_mean\_squared\_error: 1.7456

Epoch 37/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0291 - mean\_squared\_error: 1.0291 - val\_loss: 1.7439 - val\_mean\_squared\_error: 1.7439

Epoch 38/100

22/22 [==============================] - 0s 832us/step - loss: 1.0281 - mean\_squared\_error: 1.0281 - val\_loss: 1.7412 - val\_mean\_squared\_error: 1.7412

Epoch 39/100

22/22 [==============================] - 0s 464us/step - loss: 1.0273 - mean\_squared\_error: 1.0273 - val\_loss: 1.7373 - val\_mean\_squared\_error: 1.7373

Epoch 40/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0260 - mean\_squared\_error: 1.0260 - val\_loss: 1.7334 - val\_mean\_squared\_error: 1.7334

Epoch 41/100

22/22 [==============================] - 0s 4ms/step - loss: 1.0251 - mean\_squared\_error: 1.0251 - val\_loss: 1.7295 - val\_mean\_squared\_error: 1.7295

Epoch 42/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0239 - mean\_squared\_error: 1.0239 - val\_loss: 1.7261 - val\_mean\_squared\_error: 1.7261

Epoch 43/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0230 - mean\_squared\_error: 1.0230 - val\_loss: 1.7222 - val\_mean\_squared\_error: 1.7222

Epoch 44/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0218 - mean\_squared\_error: 1.0218 - val\_loss: 1.7182 - val\_mean\_squared\_error: 1.7182

Epoch 45/100

22/22 [==============================] - 0s 1ms/step - loss: 1.0208 - mean\_squared\_error: 1.0208 - val\_loss: 1.7127 - val\_mean\_squared\_error: 1.7127

Epoch 46/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0196 - mean\_squared\_error: 1.0196 - val\_loss: 1.7060 - val\_mean\_squared\_error: 1.7060

Epoch 47/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0182 - mean\_squared\_error: 1.0182 - val\_loss: 1.6996 - val\_mean\_squared\_error: 1.6996

Epoch 48/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0175 - mean\_squared\_error: 1.0175 - val\_loss: 1.6936 - val\_mean\_squared\_error: 1.6936

Epoch 49/100

22/22 [==============================] - 0s 1ms/step - loss: 1.0160 - mean\_squared\_error: 1.0160 - val\_loss: 1.6908 - val\_mean\_squared\_error: 1.6908

Epoch 50/100

22/22 [==============================] - 0s 4ms/step - loss: 1.0151 - mean\_squared\_error: 1.0151 - val\_loss: 1.6885 - val\_mean\_squared\_error: 1.6885

Epoch 51/100

22/22 [==============================] - 0s 4ms/step - loss: 1.0143 - mean\_squared\_error: 1.0143 - val\_loss: 1.6862 - val\_mean\_squared\_error: 1.6862

Epoch 52/100

22/22 [==============================] - 0s 921us/step - loss: 1.0136 - mean\_squared\_error: 1.0136 - val\_loss: 1.6838 - val\_mean\_squared\_error: 1.6838

Epoch 53/100

22/22 [==============================] - 0s 1ms/step - loss: 1.0129 - mean\_squared\_error: 1.0129 - val\_loss: 1.6795 - val\_mean\_squared\_error: 1.6795

Epoch 54/100

22/22 [==============================] - 0s 10ms/step - loss: 1.0123 - mean\_squared\_error: 1.0123 - val\_loss: 1.6759 - val\_mean\_squared\_error: 1.6759

Epoch 55/100

22/22 [==============================] - 0s 7ms/step - loss: 1.0113 - mean\_squared\_error: 1.0113 - val\_loss: 1.6728 - val\_mean\_squared\_error: 1.6728

Epoch 56/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0106 - mean\_squared\_error: 1.0106 - val\_loss: 1.6682 - val\_mean\_squared\_error: 1.6682

Epoch 57/100

22/22 [==============================] - 0s 6ms/step - loss: 1.0096 - mean\_squared\_error: 1.0096 - val\_loss: 1.6629 - val\_mean\_squared\_error: 1.6629

Epoch 58/100

22/22 [==============================] - 0s 866us/step - loss: 1.0086 - mean\_squared\_error: 1.0086 - val\_loss: 1.6578 - val\_mean\_squared\_error: 1.6578

Epoch 59/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0078 - mean\_squared\_error: 1.0078 - val\_loss: 1.6531 - val\_mean\_squared\_error: 1.6531

Epoch 60/100

22/22 [==============================] - 0s 5ms/step - loss: 1.0071 - mean\_squared\_error: 1.0071 - val\_loss: 1.6495 - val\_mean\_squared\_error: 1.6495

Epoch 61/100

22/22 [==============================] - 0s 4ms/step - loss: 1.0060 - mean\_squared\_error: 1.0060 - val\_loss: 1.6469 - val\_mean\_squared\_error: 1.6469

Epoch 62/100

22/22 [==============================] - 0s 974us/step - loss: 1.0051 - mean\_squared\_error: 1.0051 - val\_loss: 1.6424 - val\_mean\_squared\_error: 1.6424

Epoch 63/100

22/22 [==============================] - 0s 498us/step - loss: 1.0042 - mean\_squared\_error: 1.0042 - val\_loss: 1.6369 - val\_mean\_squared\_error: 1.6369

Epoch 64/100

22/22 [==============================] - 0s 2ms/step - loss: 1.0033 - mean\_squared\_error: 1.0033 - val\_loss: 1.6314 - val\_mean\_squared\_error: 1.6314

Epoch 65/100

22/22 [==============================] - 0s 779us/step - loss: 1.0020 - mean\_squared\_error: 1.0020 - val\_loss: 1.6270 - val\_mean\_squared\_error: 1.6270

Epoch 66/100

22/22 [==============================] - 0s 541us/step - loss: 1.0019 - mean\_squared\_error: 1.0019 - val\_loss: 1.6218 - val\_mean\_squared\_error: 1.6218

Epoch 67/100

22/22 [==============================] - 0s 4ms/step - loss: 1.0008 - mean\_squared\_error: 1.0008 - val\_loss: 1.6184 - val\_mean\_squared\_error: 1.6184

Epoch 68/100

22/22 [==============================] - 0s 3ms/step - loss: 1.0001 - mean\_squared\_error: 1.0001 - val\_loss: 1.6148 - val\_mean\_squared\_error: 1.6148

Epoch 69/100

22/22 [==============================] - 0s 7ms/step - loss: 0.9993 - mean\_squared\_error: 0.9993 - val\_loss: 1.6107 - val\_mean\_squared\_error: 1.6107

Epoch 70/100

22/22 [==============================] - 0s 2ms/step - loss: 0.9986 - mean\_squared\_error: 0.9986 - val\_loss: 1.6074 - val\_mean\_squared\_error: 1.6074

Epoch 71/100

22/22 [==============================] - 0s 1ms/step - loss: 0.9978 - mean\_squared\_error: 0.9979 - val\_loss: 1.6061 - val\_mean\_squared\_error: 1.6061

Epoch 72/100

22/22 [==============================] - 0s 948us/step - loss: 0.9972 - mean\_squared\_error: 0.9972 - val\_loss: 1.6057 - val\_mean\_squared\_error: 1.6057

Epoch 73/100

22/22 [==============================] - 0s 1ms/step - loss: 0.9968 - mean\_squared\_error: 0.9968 - val\_loss: 1.6048 - val\_mean\_squared\_error: 1.6048

Epoch 74/100

22/22 [==============================] - 0s 829us/step - loss: 0.9961 - mean\_squared\_error: 0.9961 - val\_loss: 1.6033 - val\_mean\_squared\_error: 1.6033

Epoch 75/100

22/22 [==============================] - 0s 9ms/step - loss: 0.9955 - mean\_squared\_error: 0.9955 - val\_loss: 1.6005 - val\_mean\_squared\_error: 1.6005

Epoch 76/100

22/22 [==============================] - 0s 2ms/step - loss: 0.9949 - mean\_squared\_error: 0.9949 - val\_loss: 1.5980 - val\_mean\_squared\_error: 1.5980

Epoch 77/100

22/22 [==============================] - 0s 3ms/step - loss: 0.9944 - mean\_squared\_error: 0.9944 - val\_loss: 1.5949 - val\_mean\_squared\_error: 1.5949

Epoch 78/100

22/22 [==============================] - 0s 11ms/step - loss: 0.9935 - mean\_squared\_error: 0.9935 - val\_loss: 1.5906 - val\_mean\_squared\_error: 1.5906

Epoch 79/100

22/22 [==============================] - 0s 3ms/step - loss: 0.9930 - mean\_squared\_error: 0.9930 - val\_loss: 1.5855 - val\_mean\_squared\_error: 1.5855

Epoch 80/100

22/22 [==============================] - 0s 1ms/step - loss: 0.9921 - mean\_squared\_error: 0.9921 - val\_loss: 1.5805 - val\_mean\_squared\_error: 1.5805

Epoch 81/100

22/22 [==============================] - 0s 2ms/step - loss: 0.9916 - mean\_squared\_error: 0.9916 - val\_loss: 1.5752 - val\_mean\_squared\_error: 1.5752

Epoch 82/100

22/22 [==============================] - 0s 2ms/step - loss: 0.9910 - mean\_squared\_error: 0.9910 - val\_loss: 1.5712 - val\_mean\_squared\_error: 1.5712

Epoch 83/100

22/22 [==============================] - 0s 2ms/step - loss: 0.9902 - mean\_squared\_error: 0.9902 - val\_loss: 1.5679 - val\_mean\_squared\_error: 1.5679

Epoch 84/100

22/22 [==============================] - 0s 661us/step - loss: 0.9897 - mean\_squared\_error: 0.9897 - val\_loss: 1.5643 - val\_mean\_squared\_error: 1.5643

Epoch 85/100

22/22 [==============================] - 0s 840us/step - loss: 0.9890 - mean\_squared\_error: 0.9890 - val\_loss: 1.5605 - val\_mean\_squared\_error: 1.5605

Epoch 86/100

22/22 [==============================] - 0s 1ms/step - loss: 0.9884 - mean\_squared\_error: 0.9884 - val\_loss: 1.5562 - val\_mean\_squared\_error: 1.5562

Epoch 87/100

22/22 [==============================] - 0s 5ms/step - loss: 0.9877 - mean\_squared\_error: 0.9877 - val\_loss: 1.5525 - val\_mean\_squared\_error: 1.5525

Epoch 88/100

22/22 [==============================] - 0s 2ms/step - loss: 0.9871 - mean\_squared\_error: 0.9871 - val\_loss: 1.5487 - val\_mean\_squared\_error: 1.5487

Epoch 89/100

22/22 [==============================] - 0s 1ms/step - loss: 0.9863 - mean\_squared\_error: 0.9863 - val\_loss: 1.5451 - val\_mean\_squared\_error: 1.5451

Epoch 90/100

22/22 [==============================] - 0s 3ms/step - loss: 0.9856 - mean\_squared\_error: 0.9856 - val\_loss: 1.5406 - val\_mean\_squared\_error: 1.5406

Epoch 91/100

22/22 [==============================] - 0s 3ms/step - loss: 0.9850 - mean\_squared\_error: 0.9850 - val\_loss: 1.5363 - val\_mean\_squared\_error: 1.5363

Epoch 92/100

22/22 [==============================] - 0s 4ms/step - loss: 0.9844 - mean\_squared\_error: 0.9844 - val\_loss: 1.5322 - val\_mean\_squared\_error: 1.5322

Epoch 93/100

22/22 [==============================] - 0s 3ms/step - loss: 0.9833 - mean\_squared\_error: 0.9833 - val\_loss: 1.5290 - val\_mean\_squared\_error: 1.5290

Epoch 94/100

22/22 [==============================] - 0s 3ms/step - loss: 0.9825 - mean\_squared\_error: 0.9825 - val\_loss: 1.5259 - val\_mean\_squared\_error: 1.5259

Epoch 95/100

22/22 [==============================] - 0s 602us/step - loss: 0.9820 - mean\_squared\_error: 0.9820 - val\_loss: 1.5237 - val\_mean\_squared\_error: 1.5237

Epoch 96/100

22/22 [==============================] - 0s 835us/step - loss: 0.9811 - mean\_squared\_error: 0.9811 - val\_loss: 1.5226 - val\_mean\_squared\_error: 1.5226

Epoch 97/100

22/22 [==============================] - 0s 7ms/step - loss: 0.9805 - mean\_squared\_error: 0.9805 - val\_loss: 1.5214 - val\_mean\_squared\_error: 1.5214

Epoch 98/100

22/22 [==============================] - 0s 5ms/step - loss: 0.9799 - mean\_squared\_error: 0.9799 - val\_loss: 1.5201 - val\_mean\_squared\_error: 1.5201

Epoch 99/100

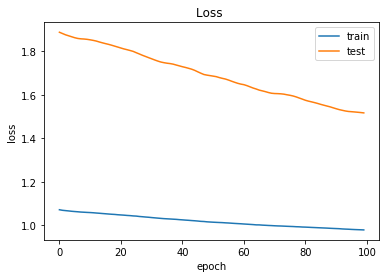
22/22 [==============================] - 0s 891us/step - loss: 0.9794 - mean\_squared\_error: 0.9794 - val\_loss: 1.5187 - val\_mean\_squared\_error: 1.5187

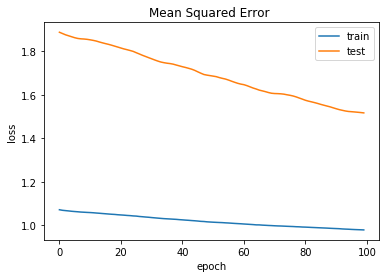
Epoch 100/100

22/22 [==============================] - 0s 4ms/step - loss: 0.9788 - mean\_squared\_error: 0.9788 - val\_loss: 1.5170 - val\_mean\_squared\_error: 1.5170

22/22 [==============================] - 0s 523us/step

8/8 [==============================] - 0s 0us/step





**TRIAL TWO :**

runfile('C:/Users/Shrishti D Hore/OneDrive/Documents/Stir\_Research/Folder/Stir\_Research\_Corrosion\_Resistance\_NN\_and\_mean\_squared\_error.py', wdir='C:/Users/Shrishti D Hore/OneDrive/Documents/Stir\_Research/Folder')

C:\Users\Shrishti D Hore\Miniconda3\envs\shripy\lib\site-packages\sklearn\utils\validation.py:595: DataConversionWarning: Data with input dtype int64 was converted to float64 by StandardScaler.

warnings.warn(msg, DataConversionWarning)

C:\Users\Shrishti D Hore\Miniconda3\envs\shripy\lib\site-packages\sklearn\utils\validation.py:595: DataConversionWarning: Data with input dtype int64 was converted to float64 by StandardScaler.

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warnings.warn(msg, DataConversionWarning)

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warnings.warn(msg, DataConversionWarning)

Train on 22 samples, validate on 8 samples

Epoch 1/100

22/22 [==============================] - 2s 113ms/step - loss: 1.3335 - mean\_squared\_error: 1.3335 - val\_loss: 0.8043 - val\_mean\_squared\_error: 0.8043

Epoch 2/100

22/22 [==============================] - 0s 7ms/step - loss: 1.3315 - mean\_squared\_error: 1.3315 - val\_loss: 0.8035 - val\_mean\_squared\_error: 0.8035

Epoch 3/100

22/22 [==============================] - 0s 1ms/step - loss: 1.3298 - mean\_squared\_error: 1.3298 - val\_loss: 0.8028 - val\_mean\_squared\_error: 0.8028

Epoch 4/100

22/22 [==============================] - 0s 2ms/step - loss: 1.3282 - mean\_squared\_error: 1.3282 - val\_loss: 0.8022 - val\_mean\_squared\_error: 0.8022

Epoch 5/100

22/22 [==============================] - 0s 2ms/step - loss: 1.3270 - mean\_squared\_error: 1.3270 - val\_loss: 0.8020 - val\_mean\_squared\_error: 0.8020

Epoch 6/100

22/22 [==============================] - 0s 2ms/step - loss: 1.3257 - mean\_squared\_error: 1.3257 - val\_loss: 0.8018 - val\_mean\_squared\_error: 0.8018

Epoch 7/100

22/22 [==============================] - 0s 2ms/step - loss: 1.3246 - mean\_squared\_error: 1.3246 - val\_loss: 0.8015 - val\_mean\_squared\_error: 0.8015

Epoch 8/100

22/22 [==============================] - 0s 3ms/step - loss: 1.3227 - mean\_squared\_error: 1.3227 - val\_loss: 0.8011 - val\_mean\_squared\_error: 0.8011

Epoch 9/100

22/22 [==============================] - 0s 968us/step - loss: 1.3214 - mean\_squared\_error: 1.3214 - val\_loss: 0.8008 - val\_mean\_squared\_error: 0.8008

Epoch 10/100

22/22 [==============================] - 0s 2ms/step - loss: 1.3199 - mean\_squared\_error: 1.3199 - val\_loss: 0.8005 - val\_mean\_squared\_error: 0.8005

Epoch 11/100

22/22 [==============================] - 0s 6ms/step - loss: 1.3183 - mean\_squared\_error: 1.3183 - val\_loss: 0.8000 - val\_mean\_squared\_error: 0.8000

Epoch 12/100

22/22 [==============================] - 0s 413us/step - loss: 1.3172 - mean\_squared\_error: 1.3172 - val\_loss: 0.7996 - val\_mean\_squared\_error: 0.7996

Epoch 13/100

22/22 [==============================] - 0s 5ms/step - loss: 1.3159 - mean\_squared\_error: 1.3159 - val\_loss: 0.7992 - val\_mean\_squared\_error: 0.7992

Epoch 14/100

22/22 [==============================] - 0s 3ms/step - loss: 1.3147 - mean\_squared\_error: 1.3147 - val\_loss: 0.7988 - val\_mean\_squared\_error: 0.7988

Epoch 15/100

22/22 [==============================] - 0s 3ms/step - loss: 1.3137 - mean\_squared\_error: 1.3137 - val\_loss: 0.7984 - val\_mean\_squared\_error: 0.7984

Epoch 16/100

22/22 [==============================] - 0s 9ms/step - loss: 1.3124 - mean\_squared\_error: 1.3124 - val\_loss: 0.7981 - val\_mean\_squared\_error: 0.7981

Epoch 17/100

22/22 [==============================] - 0s 3ms/step - loss: 1.3113 - mean\_squared\_error: 1.3113 - val\_loss: 0.7977 - val\_mean\_squared\_error: 0.7977

Epoch 18/100

22/22 [==============================] - 0s 3ms/step - loss: 1.3103 - mean\_squared\_error: 1.3103 - val\_loss: 0.7973 - val\_mean\_squared\_error: 0.7973

Epoch 19/100

22/22 [==============================] - 0s 2ms/step - loss: 1.3091 - mean\_squared\_error: 1.3091 - val\_loss: 0.7968 - val\_mean\_squared\_error: 0.7968

Epoch 20/100

22/22 [==============================] - 0s 2ms/step - loss: 1.3078 - mean\_squared\_error: 1.3078 - val\_loss: 0.7965 - val\_mean\_squared\_error: 0.7965

Epoch 21/100

22/22 [==============================] - 0s 2ms/step - loss: 1.3065 - mean\_squared\_error: 1.3065 - val\_loss: 0.7963 - val\_mean\_squared\_error: 0.7963

Epoch 22/100

22/22 [==============================] - 0s 2ms/step - loss: 1.3058 - mean\_squared\_error: 1.3058 - val\_loss: 0.7962 - val\_mean\_squared\_error: 0.7962

Epoch 23/100

22/22 [==============================] - 0s 1ms/step - loss: 1.3044 - mean\_squared\_error: 1.3044 - val\_loss: 0.7961 - val\_mean\_squared\_error: 0.7961

Epoch 24/100

22/22 [==============================] - 0s 820us/step - loss: 1.3036 - mean\_squared\_error: 1.3036 - val\_loss: 0.7961 - val\_mean\_squared\_error: 0.7961

Epoch 25/100

22/22 [==============================] - 0s 3ms/step - loss: 1.3024 - mean\_squared\_error: 1.3024 - val\_loss: 0.7960 - val\_mean\_squared\_error: 0.7960

Epoch 26/100

22/22 [==============================] - 0s 7ms/step - loss: 1.3016 - mean\_squared\_error: 1.3016 - val\_loss: 0.7958 - val\_mean\_squared\_error: 0.7958

Epoch 27/100

22/22 [==============================] - 0s 3ms/step - loss: 1.3001 - mean\_squared\_error: 1.3001 - val\_loss: 0.7954 - val\_mean\_squared\_error: 0.7954

Epoch 28/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2992 - mean\_squared\_error: 1.2992 - val\_loss: 0.7950 - val\_mean\_squared\_error: 0.7950

Epoch 29/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2979 - mean\_squared\_error: 1.2979 - val\_loss: 0.7945 - val\_mean\_squared\_error: 0.7945

Epoch 30/100

22/22 [==============================] - 0s 7ms/step - loss: 1.2967 - mean\_squared\_error: 1.2967 - val\_loss: 0.7942 - val\_mean\_squared\_error: 0.7942

Epoch 31/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2955 - mean\_squared\_error: 1.2955 - val\_loss: 0.7938 - val\_mean\_squared\_error: 0.7938

Epoch 32/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2946 - mean\_squared\_error: 1.2946 - val\_loss: 0.7934 - val\_mean\_squared\_error: 0.7934

Epoch 33/100

22/22 [==============================] - 0s 2ms/step - loss: 1.2934 - mean\_squared\_error: 1.2934 - val\_loss: 0.7929 - val\_mean\_squared\_error: 0.7929

Epoch 34/100

22/22 [==============================] - 0s 5ms/step - loss: 1.2921 - mean\_squared\_error: 1.2921 - val\_loss: 0.7924 - val\_mean\_squared\_error: 0.7924

Epoch 35/100

22/22 [==============================] - 0s 597us/step - loss: 1.2906 - mean\_squared\_error: 1.2906 - val\_loss: 0.7918 - val\_mean\_squared\_error: 0.7918

Epoch 36/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2889 - mean\_squared\_error: 1.2889 - val\_loss: 0.7911 - val\_mean\_squared\_error: 0.7911

Epoch 37/100

22/22 [==============================] - 0s 9ms/step - loss: 1.2881 - mean\_squared\_error: 1.2881 - val\_loss: 0.7904 - val\_mean\_squared\_error: 0.7904

Epoch 38/100

22/22 [==============================] - 0s 774us/step - loss: 1.2866 - mean\_squared\_error: 1.2866 - val\_loss: 0.7899 - val\_mean\_squared\_error: 0.7899

Epoch 39/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2853 - mean\_squared\_error: 1.2853 - val\_loss: 0.7895 - val\_mean\_squared\_error: 0.7895

Epoch 40/100

22/22 [==============================] - 0s 4ms/step - loss: 1.2842 - mean\_squared\_error: 1.2842 - val\_loss: 0.7891 - val\_mean\_squared\_error: 0.7891

Epoch 41/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2832 - mean\_squared\_error: 1.2832 - val\_loss: 0.7887 - val\_mean\_squared\_error: 0.7887

Epoch 42/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2822 - mean\_squared\_error: 1.2822 - val\_loss: 0.7883 - val\_mean\_squared\_error: 0.7883

Epoch 43/100

22/22 [==============================] - 0s 292us/step - loss: 1.2805 - mean\_squared\_error: 1.2805 - val\_loss: 0.7878 - val\_mean\_squared\_error: 0.7878

Epoch 44/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2795 - mean\_squared\_error: 1.2795 - val\_loss: 0.7873 - val\_mean\_squared\_error: 0.7873

Epoch 45/100

22/22 [==============================] - 0s 4ms/step - loss: 1.2776 - mean\_squared\_error: 1.2776 - val\_loss: 0.7869 - val\_mean\_squared\_error: 0.7869

Epoch 46/100

22/22 [==============================] - 0s 873us/step - loss: 1.2768 - mean\_squared\_error: 1.2768 - val\_loss: 0.7864 - val\_mean\_squared\_error: 0.7864

Epoch 47/100

22/22 [==============================] - 0s 6ms/step - loss: 1.2750 - mean\_squared\_error: 1.2750 - val\_loss: 0.7860 - val\_mean\_squared\_error: 0.7860

Epoch 48/100

22/22 [==============================] - 0s 981us/step - loss: 1.2738 - mean\_squared\_error: 1.2738 - val\_loss: 0.7856 - val\_mean\_squared\_error: 0.7856

Epoch 49/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2732 - mean\_squared\_error: 1.2732 - val\_loss: 0.7852 - val\_mean\_squared\_error: 0.7852

Epoch 50/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2717 - mean\_squared\_error: 1.2717 - val\_loss: 0.7849 - val\_mean\_squared\_error: 0.7849

Epoch 51/100

22/22 [==============================] - 0s 4ms/step - loss: 1.2708 - mean\_squared\_error: 1.2708 - val\_loss: 0.7847 - val\_mean\_squared\_error: 0.7847

Epoch 52/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2697 - mean\_squared\_error: 1.2697 - val\_loss: 0.7846 - val\_mean\_squared\_error: 0.7846

Epoch 53/100

22/22 [==============================] - 0s 886us/step - loss: 1.2688 - mean\_squared\_error: 1.2688 - val\_loss: 0.7843 - val\_mean\_squared\_error: 0.7843

Epoch 54/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2683 - mean\_squared\_error: 1.2683 - val\_loss: 0.7840 - val\_mean\_squared\_error: 0.7840

Epoch 55/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2674 - mean\_squared\_error: 1.2674 - val\_loss: 0.7837 - val\_mean\_squared\_error: 0.7837

Epoch 56/100

22/22 [==============================] - 0s 726us/step - loss: 1.2665 - mean\_squared\_error: 1.2665 - val\_loss: 0.7832 - val\_mean\_squared\_error: 0.7832

Epoch 57/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2661 - mean\_squared\_error: 1.2661 - val\_loss: 0.7828 - val\_mean\_squared\_error: 0.7828

Epoch 58/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2651 - mean\_squared\_error: 1.2651 - val\_loss: 0.7826 - val\_mean\_squared\_error: 0.7826

Epoch 59/100

22/22 [==============================] - 0s 2ms/step - loss: 1.2644 - mean\_squared\_error: 1.2644 - val\_loss: 0.7825 - val\_mean\_squared\_error: 0.7825

Epoch 60/100

22/22 [==============================] - 0s 618us/step - loss: 1.2638 - mean\_squared\_error: 1.2638 - val\_loss: 0.7823 - val\_mean\_squared\_error: 0.7823

Epoch 61/100

22/22 [==============================] - 0s 2ms/step - loss: 1.2631 - mean\_squared\_error: 1.2631 - val\_loss: 0.7820 - val\_mean\_squared\_error: 0.7820

Epoch 62/100

22/22 [==============================] - 0s 10ms/step - loss: 1.2626 - mean\_squared\_error: 1.2626 - val\_loss: 0.7818 - val\_mean\_squared\_error: 0.7818

Epoch 63/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2619 - mean\_squared\_error: 1.2619 - val\_loss: 0.7817 - val\_mean\_squared\_error: 0.7817

Epoch 64/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2615 - mean\_squared\_error: 1.2615 - val\_loss: 0.7818 - val\_mean\_squared\_error: 0.7818

Epoch 65/100

22/22 [==============================] - 0s 6ms/step - loss: 1.2609 - mean\_squared\_error: 1.2609 - val\_loss: 0.7817 - val\_mean\_squared\_error: 0.7817

Epoch 66/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2604 - mean\_squared\_error: 1.2604 - val\_loss: 0.7816 - val\_mean\_squared\_error: 0.7816

Epoch 67/100

22/22 [==============================] - 0s 2ms/step - loss: 1.2597 - mean\_squared\_error: 1.2597 - val\_loss: 0.7813 - val\_mean\_squared\_error: 0.7813

Epoch 68/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2589 - mean\_squared\_error: 1.2589 - val\_loss: 0.7810 - val\_mean\_squared\_error: 0.7810

Epoch 69/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2578 - mean\_squared\_error: 1.2578 - val\_loss: 0.7807 - val\_mean\_squared\_error: 0.7807

Epoch 70/100

22/22 [==============================] - 0s 2ms/step - loss: 1.2569 - mean\_squared\_error: 1.2569 - val\_loss: 0.7801 - val\_mean\_squared\_error: 0.7801

Epoch 71/100

22/22 [==============================] - 0s 2ms/step - loss: 1.2557 - mean\_squared\_error: 1.2557 - val\_loss: 0.7793 - val\_mean\_squared\_error: 0.7793

Epoch 72/100

22/22 [==============================] - 0s 4ms/step - loss: 1.2544 - mean\_squared\_error: 1.2544 - val\_loss: 0.7784 - val\_mean\_squared\_error: 0.7784

Epoch 73/100

22/22 [==============================] - 0s 719us/step - loss: 1.2530 - mean\_squared\_error: 1.2530 - val\_loss: 0.7777 - val\_mean\_squared\_error: 0.7777

Epoch 74/100

22/22 [==============================] - 0s 5ms/step - loss: 1.2519 - mean\_squared\_error: 1.2519 - val\_loss: 0.7769 - val\_mean\_squared\_error: 0.7769

Epoch 75/100

22/22 [==============================] - 0s 11ms/step - loss: 1.2507 - mean\_squared\_error: 1.2507 - val\_loss: 0.7764 - val\_mean\_squared\_error: 0.7764

Epoch 76/100

22/22 [==============================] - 0s 2ms/step - loss: 1.2494 - mean\_squared\_error: 1.2494 - val\_loss: 0.7759 - val\_mean\_squared\_error: 0.7759

Epoch 77/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2482 - mean\_squared\_error: 1.2482 - val\_loss: 0.7752 - val\_mean\_squared\_error: 0.7752

Epoch 78/100

22/22 [==============================] - 0s 4ms/step - loss: 1.2469 - mean\_squared\_error: 1.2469 - val\_loss: 0.7742 - val\_mean\_squared\_error: 0.7742

Epoch 79/100

22/22 [==============================] - 0s 2ms/step - loss: 1.2459 - mean\_squared\_error: 1.2459 - val\_loss: 0.7734 - val\_mean\_squared\_error: 0.7734

Epoch 80/100

22/22 [==============================] - 0s 554us/step - loss: 1.2444 - mean\_squared\_error: 1.2444 - val\_loss: 0.7724 - val\_mean\_squared\_error: 0.7724

Epoch 81/100

22/22 [==============================] - 0s 942us/step - loss: 1.2430 - mean\_squared\_error: 1.2430 - val\_loss: 0.7716 - val\_mean\_squared\_error: 0.7716

Epoch 82/100

22/22 [==============================] - 0s 667us/step - loss: 1.2419 - mean\_squared\_error: 1.2419 - val\_loss: 0.7707 - val\_mean\_squared\_error: 0.7707

Epoch 83/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2404 - mean\_squared\_error: 1.2404 - val\_loss: 0.7696 - val\_mean\_squared\_error: 0.7696

Epoch 84/100

22/22 [==============================] - 0s 2ms/step - loss: 1.2388 - mean\_squared\_error: 1.2388 - val\_loss: 0.7685 - val\_mean\_squared\_error: 0.7685

Epoch 85/100

22/22 [==============================] - 0s 690us/step - loss: 1.2379 - mean\_squared\_error: 1.2379 - val\_loss: 0.7675 - val\_mean\_squared\_error: 0.7675

Epoch 86/100

22/22 [==============================] - 0s 9ms/step - loss: 1.2363 - mean\_squared\_error: 1.2363 - val\_loss: 0.7667 - val\_mean\_squared\_error: 0.7667

Epoch 87/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2354 - mean\_squared\_error: 1.2354 - val\_loss: 0.7658 - val\_mean\_squared\_error: 0.7658

Epoch 88/100

22/22 [==============================] - 0s 5ms/step - loss: 1.2343 - mean\_squared\_error: 1.2343 - val\_loss: 0.7650 - val\_mean\_squared\_error: 0.7650

Epoch 89/100

22/22 [==============================] - 0s 3ms/step - loss: 1.2332 - mean\_squared\_error: 1.2332 - val\_loss: 0.7645 - val\_mean\_squared\_error: 0.7645

Epoch 90/100

22/22 [==============================] - 0s 647us/step - loss: 1.2325 - mean\_squared\_error: 1.2325 - val\_loss: 0.7638 - val\_mean\_squared\_error: 0.7638

Epoch 91/100

22/22 [==============================] - 0s 4ms/step - loss: 1.2315 - mean\_squared\_error: 1.2315 - val\_loss: 0.7630 - val\_mean\_squared\_error: 0.7630

Epoch 92/100

22/22 [==============================] - 0s 6ms/step - loss: 1.2308 - mean\_squared\_error: 1.2308 - val\_loss: 0.7620 - val\_mean\_squared\_error: 0.7620

Epoch 93/100

22/22 [==============================] - 0s 1ms/step - loss: 1.2292 - mean\_squared\_error: 1.2292 - val\_loss: 0.7613 - val\_mean\_squared\_error: 0.7613

Epoch 94/100

22/22 [==============================] - 0s 709us/step - loss: 1.2284 - mean\_squared\_error: 1.2284 - val\_loss: 0.7606 - val\_mean\_squared\_error: 0.7606

Epoch 95/100

22/22 [==============================] - 0s 722us/step - loss: 1.2275 - mean\_squared\_error: 1.2275 - val\_loss: 0.7599 - val\_mean\_squared\_error: 0.7599

Epoch 96/100

22/22 [==============================] - 0s 9ms/step - loss: 1.2263 - mean\_squared\_error: 1.2263 - val\_loss: 0.7596 - val\_mean\_squared\_error: 0.7596

Epoch 97/100

22/22 [==============================] - 0s 359us/step - loss: 1.2254 - mean\_squared\_error: 1.2254 - val\_loss: 0.7592 - val\_mean\_squared\_error: 0.7592

Epoch 98/100

22/22 [==============================] - 0s 4ms/step - loss: 1.2246 - mean\_squared\_error: 1.2246 - val\_loss: 0.7589 - val\_mean\_squared\_error: 0.7589

Epoch 99/100

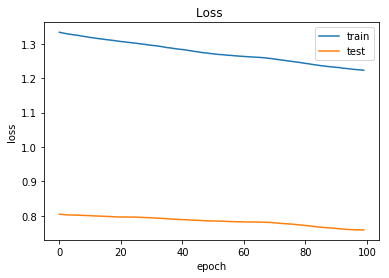
22/22 [==============================] - 0s 3ms/step - loss: 1.2239 - mean\_squared\_error: 1.2239 - val\_loss: 0.7587 - val\_mean\_squared\_error: 0.7587

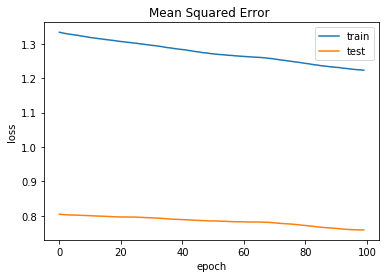
Epoch 100/100

22/22 [==============================] - 0s 821us/step - loss: 1.2231 - mean\_squared\_error: 1.2231 - val\_loss: 0.7587 - val\_mean\_squared\_error: 0.7587

22/22 [==============================] - 0s 0us/step

8/8 [==============================] - 0s 125us/step





**TRIAL THREE :**

Epoch 72/100

22/22 [==============================] - 0s 945us/step - loss: 1.4821 - mean\_squared\_error: 1.4821 - val\_loss: 0.4789 - val\_mean\_squared\_error: 0.4789

Epoch 73/100

22/22 [==============================] - 0s 980us/step - loss: 1.4815 - mean\_squared\_error: 1.4815 - val\_loss: 0.4788 - val\_mean\_squared\_error: 0.4788

Epoch 74/100

22/22 [==============================] - 0s 4ms/step - loss: 1.4811 - mean\_squared\_error: 1.4811 - val\_loss: 0.4787 - val\_mean\_squared\_error: 0.4787

Epoch 75/100

22/22 [==============================] - 0s 4ms/step - loss: 1.4805 - mean\_squared\_error: 1.4805 - val\_loss: 0.4786 - val\_mean\_squared\_error: 0.4786

Epoch 76/100

22/22 [==============================] - 0s 2ms/step - loss: 1.4799 - mean\_squared\_error: 1.4799 - val\_loss: 0.4785 - val\_mean\_squared\_error: 0.4785

Epoch 77/100

22/22 [==============================] - 0s 1ms/step - loss: 1.4793 - mean\_squared\_error: 1.4793 - val\_loss: 0.4783 - val\_mean\_squared\_error: 0.4783

Epoch 78/100

22/22 [==============================] - 0s 4ms/step - loss: 1.4787 - mean\_squared\_error: 1.4787 - val\_loss: 0.4782 - val\_mean\_squared\_error: 0.4782

Epoch 79/100

22/22 [==============================] - 0s 790us/step - loss: 1.4781 - mean\_squared\_error: 1.4781 - val\_loss: 0.4780 - val\_mean\_squared\_error: 0.4780

Epoch 80/100

22/22 [==============================] - 0s 3ms/step - loss: 1.4775 - mean\_squared\_error: 1.4775 - val\_loss: 0.4779 - val\_mean\_squared\_error: 0.4779

Epoch 81/100

22/22 [==============================] - 0s 5ms/step - loss: 1.4769 - mean\_squared\_error: 1.4769 - val\_loss: 0.4778 - val\_mean\_squared\_error: 0.4778

Epoch 82/100

22/22 [==============================] - 0s 3ms/step - loss: 1.4763 - mean\_squared\_error: 1.4763 - val\_loss: 0.4776 - val\_mean\_squared\_error: 0.4776

Epoch 83/100

22/22 [==============================] - 0s 5ms/step - loss: 1.4757 - mean\_squared\_error: 1.4757 - val\_loss: 0.4774 - val\_mean\_squared\_error: 0.4774

Epoch 84/100

22/22 [==============================] - 0s 959us/step - loss: 1.4749 - mean\_squared\_error: 1.4749 - val\_loss: 0.4773 - val\_mean\_squared\_error: 0.4773

Epoch 85/100

22/22 [==============================] - 0s 7ms/step - loss: 1.4744 - mean\_squared\_error: 1.4744 - val\_loss: 0.4773 - val\_mean\_squared\_error: 0.4773

Epoch 86/100

22/22 [==============================] - 0s 2ms/step - loss: 1.4735 - mean\_squared\_error: 1.4735 - val\_loss: 0.4772 - val\_mean\_squared\_error: 0.4772

Epoch 87/100

22/22 [==============================] - 0s 577us/step - loss: 1.4730 - mean\_squared\_error: 1.4730 - val\_loss: 0.4772 - val\_mean\_squared\_error: 0.4772

Epoch 88/100

22/22 [==============================] - 0s 4ms/step - loss: 1.4723 - mean\_squared\_error: 1.4723 - val\_loss: 0.4773 - val\_mean\_squared\_error: 0.4773

Epoch 89/100

22/22 [==============================] - 0s 4ms/step - loss: 1.4717 - mean\_squared\_error: 1.4717 - val\_loss: 0.4773 - val\_mean\_squared\_error: 0.4773

Epoch 90/100

22/22 [==============================] - 0s 1ms/step - loss: 1.4711 - mean\_squared\_error: 1.4711 - val\_loss: 0.4774 - val\_mean\_squared\_error: 0.4774

Epoch 91/100

22/22 [==============================] - 0s 1ms/step - loss: 1.4702 - mean\_squared\_error: 1.4702 - val\_loss: 0.4776 - val\_mean\_squared\_error: 0.4776

Epoch 92/100

22/22 [==============================] - 0s 865us/step - loss: 1.4696 - mean\_squared\_error: 1.4696 - val\_loss: 0.4778 - val\_mean\_squared\_error: 0.4778

Epoch 93/100

22/22 [==============================] - 0s 4ms/step - loss: 1.4689 - mean\_squared\_error: 1.4689 - val\_loss: 0.4779 - val\_mean\_squared\_error: 0.4779

Epoch 94/100

22/22 [==============================] - 0s 3ms/step - loss: 1.4682 - mean\_squared\_error: 1.4682 - val\_loss: 0.4778 - val\_mean\_squared\_error: 0.4778

Epoch 95/100

22/22 [==============================] - 0s 5ms/step - loss: 1.4674 - mean\_squared\_error: 1.4674 - val\_loss: 0.4778 - val\_mean\_squared\_error: 0.4778

Epoch 96/100

22/22 [==============================] - 0s 3ms/step - loss: 1.4667 - mean\_squared\_error: 1.4667 - val\_loss: 0.4779 - val\_mean\_squared\_error: 0.4779

Epoch 97/100

22/22 [==============================] - 0s 2ms/step - loss: 1.4661 - mean\_squared\_error: 1.4661 - val\_loss: 0.4781 - val\_mean\_squared\_error: 0.4781

Epoch 98/100

22/22 [==============================] - 0s 3ms/step - loss: 1.4656 - mean\_squared\_error: 1.4656 - val\_loss: 0.4783 - val\_mean\_squared\_error: 0.4783

Epoch 99/100

22/22 [==============================] - 0s 2ms/step - loss: 1.4650 - mean\_squared\_error: 1.4650 - val\_loss: 0.4786 - val\_mean\_squared\_error: 0.4786

Epoch 100/100

22/22 [==============================] - 0s 3ms/step - loss: 1.4645 - mean\_squared\_error: 1.4645 - val\_loss: 0.4788 - val\_mean\_squared\_error: 0.4788

22/22 [==============================] - 0s 45us/step

8/8 [==============================] - 0s 96us/step

