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1 C:\Users\vince\anaconda3\python.exe "D:/
  Documents/Choses école/UQAC/Session7/8INF436-
  Forage_de_donnees/TP3/main.py"
2 2021-04-06 11:08:27.971752: W tensorflow/
  stream_executor/platform/default/dso_loader.
  cc:60] Could not load dynamic library '
  cudart64_110.dll'; dlerror: cudart64_110.dll
  not found
3 2021-04-06 11:08:27.971857: I tensorflow/
  stream_executor/cuda/cudart_stub.cc:29]
  Ignore above cudart dlerror if you do not
  have a GPU set up on your machine.
4 Missing values per attribute:
5 id                                0
6 gender                            0
7 age                              0
8 hypertension                      0
9 heart_disease                    0
10 ever_married                     0
11 work_type                         0
12 Residence_type                   0
13 avg_glucose_level                0
14 bmi                              0
15 smoking_status                   0
16 stroke                           0
17 dtype: int64
18 C:\Users\vince\anaconda3\lib\site-packages\
  pandas\core\indexing.py:1736:
  SettingWithCopyWarning:
19 A value is trying to be set on a copy of a
  slice from a DataFrame.
20 Try using .loc[row_indexer,col_indexer] =
  value instead
21
22 See the caveats in the documentation: https://pandas.pydata.org/pandas-docs/stable/user\_guide/indexing.html#returning-a-view-versus-a-copy
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23  isetter(loc, value[:, i].tolist())
24  <class 'pandas.core.frame.DataFrame'>
25  Int64Index: 4860 entries, 0 to 5109
26  Data columns (total 10 columns):
27  #    Column                                Non-Null Count  Dtype
28  ---  -
29  0    gender                                4860 non-null   float64
30  1    age                                  4860 non-null   float64
31  2    hypertension                        4860 non-null   float64
32  3    heart_disease                      4860 non-null   float64
33  4    ever_married                      4860 non-null   float64
34  5    work_type                          4860 non-null   float64
35  6    Residence_type                    4860 non-null   float64
36  7    avg_glucose_level                4860 non-null   float64
37  8    bmi                               4860 non-null   float64
38  9    smoking_status                   4860 non-null   float64
39  dtypes: float64(10)
40  memory usage: 417.7 KB
41  None
42
43  Auto-encodeurs linéaires incomplets à 3
    couches
44  La couche 1 possède 2 unités
45  La couche 2 possède 2 unités
46  2021-04-06 11:08:30.009114: I tensorflow/
    compiler/jit/xla_cpu_device.cc:41] Not

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46 creating XLA devices,  
   tf_xla_enable_xla_devices not set  
47 2021-04-06 11:08:30.009772: I tensorflow/  
   stream_executor/platform/default/dso_loader.  
   cc:49] Successfully opened dynamic library  
   nvcuda.dll  
48 2021-04-06 11:08:30.033679: I tensorflow/core  
   /common_runtime/gpu/gpu_device.cc:1720] Found  
   device 0 with properties:  
49 pciBusID: 0000:08:00.0 name: GeForce RTX 2080  
   computeCapability: 7.5  
50 coreClock: 1.71GHz coreCount: 46  
   deviceMemorySize: 8.00GiB  
   deviceMemoryBandwidth: 417.23GiB/s  
51 2021-04-06 11:08:30.034416: W tensorflow/  
   stream_executor/platform/default/dso_loader.  
   cc:60] Could not load dynamic library '  
   cudart64_110.dll'; dlerror: cudart64_110.dll  
   not found  
52 2021-04-06 11:08:30.034976: W tensorflow/  
   stream_executor/platform/default/dso_loader.  
   cc:60] Could not load dynamic library '  
   cublas64_11.dll'; dlerror: cublas64_11.dll  
   not found  
53 2021-04-06 11:08:30.035526: W tensorflow/  
   stream_executor/platform/default/dso_loader.  
   cc:60] Could not load dynamic library '  
   cublasLt64_11.dll'; dlerror: cublasLt64_11.  
   dll not found  
54 2021-04-06 11:08:30.036078: W tensorflow/  
   stream_executor/platform/default/dso_loader.  
   cc:60] Could not load dynamic library '  
   cufft64_10.dll'; dlerror: cufft64_10.dll not  
   found  
55 2021-04-06 11:08:30.036635: W tensorflow/  
   stream_executor/platform/default/dso_loader.  
   cc:60] Could not load dynamic library '  
   curand64_10.dll'; dlerror: curand64_10.dll
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55 not found
56 2021-04-06 11:08:30.037177: W tensorflow/
stream_executor/platform/default/dso_loader.
cc:60] Could not load dynamic library '
cusolver64_10.dll'; dlerror: cusolver64_10.
dll not found
57 2021-04-06 11:08:30.037721: W tensorflow/
stream_executor/platform/default/dso_loader.
cc:60] Could not load dynamic library '
cusparse64_11.dll'; dlerror: cusparse64_11.
dll not found
58 2021-04-06 11:08:30.038269: W tensorflow/
stream_executor/platform/default/dso_loader.
cc:60] Could not load dynamic library '
cudnn64_8.dll'; dlerror: cudnn64_8.dll not
found
59 2021-04-06 11:08:30.038358: W tensorflow/core
/common_runtime/gpu/gpu_device.cc:1757]
Cannot dlopen some GPU libraries. Please make
sure the missing libraries mentioned above
are installed properly if you would like to
use GPU. Follow the guide at https://www.
tensorflow.org/install/gpu for how to
download and setup the required libraries for
your platform.
60 Skipping registering GPU devices...
61 2021-04-06 11:08:30.038958: I tensorflow/core
/platform/cpu_feature_guard.cc:142] This
TensorFlow binary is optimized with oneAPI
Deep Neural Network Library (oneDNN) to use
the following CPU instructions in performance
-critical operations: AVX2
62 To enable them in other operations, rebuild
TensorFlow with the appropriate compiler
flags.
63 2021-04-06 11:08:30.039795: I tensorflow/core
/common_runtime/gpu/gpu_device.cc:1261]
Device interconnect StreamExecutor with
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63 strength 1 edge matrix:
64 2021-04-06 11:08:30.039888: I tensorflow/
  core/common_runtime/gpu/gpu_device.cc:1267
  ]
65 2021-04-06 11:08:30.039943: I tensorflow/
  compiler/jit/xla_gpu_device.cc:99] Not
  creating XLA devices,
  tf_xla_enable_xla_devices not set
66 2021-04-06 11:08:30.105135: I tensorflow/
  compiler/mlir/mlir_graph_optimization_pass.
  cc:116] None of the MLIR optimization passes
  are enabled (registered 2)
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394 23/23 [=====] - 0s
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399 23/23 [=====] - 0s
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400 23/23 [=====] - 0s
    364us/step
401 La couche 1 possède 6 unités
402 La couche 2 possède 2 unités
403 23/23 [=====] - 0s
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408 23/23 [=====] - 0s
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410 23/23 [=====] - 0s
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411 23/23 [=====] - 0s
    318us/step
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412 23/23 [=====] - 0s
    318us/step
413 La couche 1 possède 6 unités
414 La couche 2 possède 3 unités
415 23/23 [=====] - 0s
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423 23/23 [=====] - 0s
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424 23/23 [=====] - 0s
    318us/step
425 La couche 1 possède 6 unités
426 La couche 2 possède 4 unités
427 23/23 [=====] - 0s
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428 23/23 [=====] - 0s
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429 23/23 [=====] - 0s
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433 23/23 [=====] - 0s
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437 La couche 1 possède 6 unités
438 La couche 2 possède 5 unités
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448 23/23 [=====] - 0s
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449 La couche 1 possède 6 unités
450 La couche 2 possède 6 unités
451 23/23 [=====] - 0s
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454 23/23 [=====] - 0s
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459 23/23 [=====] - 0s
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460 23/23 [=====] - 0s
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461 La couche 1 possède 6 unités
462 La couche 2 possède 7 unités
463 23/23 [=====] - 0s
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464 23/23 [=====] - 0s
    318us/step
465 23/23 [=====] - 0s
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466 23/23 [=====] - 0s
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467 23/23 [=====] - 0s
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469 23/23 [=====] - 0s
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470 23/23 [=====] - 0s
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471 23/23 [=====] - 0s
    318us/step
472 23/23 [=====] - 0s
    318us/step
473 La couche 1 possède 6 unités
474 La couche 2 possède 8 unités
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475 23/23 [=====] - 0s
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476 23/23 [=====] - 0s
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485 La couche 1 possède 7 unités
486 La couche 2 possède 2 unités
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497 La couche 1 possède 7 unités
498 La couche 2 possède 3 unités
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509 La couche 1 possède 7 unités
510 La couche 2 possède 4 unités
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521 La couche 1 possède 7 unités
522 La couche 2 possède 5 unités
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525 23/23 [=====] - 0s
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533 La couche 1 possède 7 unités
534 La couche 2 possède 6 unités
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537 23/23 [=====] - 0s
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545 La couche 1 possède 7 unités
546 La couche 2 possède 7 unités
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557 La couche 1 possède 7 unités
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569 La couche 1 possède 8 unités
570 La couche 2 possède 2 unités
571 23/23 [=====] - 0s
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578 23/23 [=====] - 0s
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579 23/23 [=====] - 0s
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581 La couche 1 possède 8 unités
582 La couche 2 possède 3 unités
583 23/23 [=====] - 0s
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584 23/23 [=====] - 0s
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591 23/23 [=====] - 0s
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592 23/23 [=====] - 0s
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593 La couche 1 possède 8 unités
594 La couche 2 possède 4 unités
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605 La couche 1 possède 8 unités
606 La couche 2 possède 5 unités
607 23/23 [=====] - 0s
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615 23/23 [=====] - 0s
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616 23/23 [=====] - 0s
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617 La couche 1 possède 8 unités
618 La couche 2 possède 6 unités
619 23/23 [=====] - 0s
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620 23/23 [=====] - 0s
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625 23/23 [=====] - 0s
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626 23/23 [=====] - 0s
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627 23/23 [=====] - 0s
    349us/step
628 23/23 [=====] - 0s
    318us/step
629 La couche 1 possède 8 unités
630 La couche 2 possède 7 unités
631 23/23 [=====] - 0s
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632 23/23 [=====] - 0s
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633 23/23 [=====] - 0s
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634 23/23 [=====] - 0s
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635 23/23 [=====] - 0s
    273us/step
636 23/23 [=====] - 0s
    364us/step
637 23/23 [=====] - 0s
    318us/step
638 23/23 [=====] - 0s
    318us/step
639 23/23 [=====] - 0s
    318us/step
```



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640 23/23 [=====] - 0s
    318us/step
641 La couche 1 possède 8 unités
642 La couche 2 possède 8 unités
643 23/23 [=====] - 0s
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644 23/23 [=====] - 0s
    318us/step
645 23/23 [=====] - 0s
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646 23/23 [=====] - 0s
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647 23/23 [=====] - 0s
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648 23/23 [=====] - 0s
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649 23/23 [=====] - 0s
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650 23/23 [=====] - 0s
    273us/step
651 23/23 [=====] - 0s
    318us/step
652 23/23 [=====] - 0s
    318us/step
653 Scores moyens(précision moyenne et écart-
    type) pour les auto-encodeurs linéaires
    incomplets à 2 couches:
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    17946612114176647, 0.1316), '2,8': (0.
    17107349265001473, 0.1223), '3,2': (0.
    1756120917991755, 0.186), '3,3': (0.
    16614849935288623, 0.1104), '3,4': (0.
    17997920756113525, 0.1281), '3,5': (0.
    17946341342664765, 0.1226), '3,6': (0.

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 14723698707232646, 0.2731)}

File - main

655

656 Process finished with exit code 0

657