There is a tutorial provided by miNDAR, which can be used.

Steps for downloading the data.

1. Login on https://ndar.nih.gov/
2. For each study in the Volumetrix or Imaging Data, Click 'Download' from

   Main Collection: https://ndar.nih.gov/edit_collection.html?id=3104

   Training dataset: https://ndar.nih.gov/study.html?id=635

   Test dataset: https://ndar.nih.gov/study.html?id=643

   Validation dataset: https://ndar.nih.gov/study.html?id=642

3. It will be added to the Selected Filters in the top right corner of the page.
4. Click on 'Download/Add to Study'
5. Select all the data related to ABCD-NP Challenge to be included for download.
6. Then, click on 'create package'. Give it a package name, and check Include associated data files.
7. You will be navigated to the packages page, soon after the package is created.
8. Here, on the package just created, click on 'Actions' and choose 'Create miNDAR'
9. Then, set a password. You will be given a miNDAR user, and with this password you can access the data. You will receive an email with the username, or you can click on 'Actions' again and choose 'View Connection Details' to see the username and other info. You will see the host name, port, and service name here as well.
10. To connect to the data servers, download and install 'Oracle SQL Developer'. It requires to create Oracle account, which is free.
11. Connect to the database, run 'Oracle SQL Developer'. Click on the '+' sign to add new connection. Give it a name, put your username and password (retrieved from Step 9). For the hostname input the host you got in Step 9. Service Name: ORCL, and Port: 1521. Test the connection and if succeeds, you are done.
12. Press connect. Then, the database is completely created.
13. From the database, go to the table S3 Links (for the imaging data) and the table BTSV01 (for the preprocessed volumetric data. Load the data in the 'Data' tab in the right pane. For the volumetric data, you can expeort the table into CSV or any format desired. For the imaging data, copy the S3 links from to the files you want to download.
14. Download the data manager from the same page as in Step 8, and run it.
15. Download the Amazon AWS Command Line Interface (CLI). After you install you can simply test if it is properly installed:

    >> cmd
    >> aws

    This should give you an aws error message, but it means that AWS CLI is properly installed.

16. From the download manager GUI, click on 'Tools' menu, and select 'Generate AWS' credentials.
17. Copy the keys (Access Key and Secret Key) and the Session Token and save them in a text file. Note that the Session token is valid for 24 hours and should be retrieved separately every time we need to access the server.
18. To use the AWS S3 API, open the AWS CLI.
19. Run, the following command and then input the info as prompted:

    >> aws configure
    >> AWS Acess Key ID: xxx
    >> AWS Secret Access Key: → xxx
    >> Default region name: → us-east-1
    >> Default output format → just press enter (default is JSON)

20. Go to user default user folder and find the folder `.aws'
21. The AWS config and credential files are here. Open the credentials file, and add the Session token to it, as it is missing.
22. Go back to command line (>> cmd) and Run the command:

    >> aws s3 cp [S3 LINK] [Dest]

    where, [S3 Link] is retrieved from Step 13, and [Dest] is the destination the files should be copied to. This should copy the file.