

## Test 1 – Web scraping

**Requirement** – To insert the director identification number (DIN) values shared in the xls workbook in the below mentioned field and URL and extract the output in an csv or txt file. This module should work on any given number of DIN values provided in an input csv file and post-extraction from the web the output should be available in an cvs or txt file with the name of the director and DIN value.

**Web URL** – <http://www.mca.gov.in/mcafoportal/showVerifyDIN.do>

**Input Field Name** – DIN/DPIN

Input Screen – 1

1. To insert DIN value

The screenshot displays the MCA Services portal interface. At the top, there is a navigation bar with links like 'Welcome Guest', 'Corporate Seva Kendra', 'Forms & Downloads', 'Sitemap', 'Login', and 'Register'. Below this is the Ministry of Corporate Affairs logo and the tagline 'EMPOWERING BUSINESS, PROTECTING INVESTORS'. The main menu includes 'HOME', 'ABOUT MCA', 'ACTS & RULES', 'MY WORKSPACE', 'MCA SERVICES' (highlighted), 'DATA & REPORTS', 'CONTACTS', and 'HELP & FAQs'. The 'MCA Services' section shows a breadcrumb trail: 'Home > MCA Services > DIN Services > Verify DIN/DPIN-PAN Details Of Director/Designated Partner'. On the left, there is a sidebar with a list of services: 'DSC Services', 'DIN Services' (expanded), 'Master Data', 'LLP Services', 'LLP Services For Business User', 'e-Filing', 'Company Services', 'Complaints', 'Document Related Services', and 'Fee and Payment Services'. Under 'DIN Services', the options are 'Apply for DIN', 'Enquire DIN Status', and 'Verify DIN PAN Details of Director' (selected). The main content area is titled 'Verify DIN/DPIN-PAN Details Of Director/Designated Partner' and contains a form with a text input field labeled 'DIN/ DPIN' containing the value '00180427', and two buttons: 'Submit' and 'Reset'.

## 2. Click on Submit

### Output Screen – 1

The screenshot shows the MCA21 portal interface. The header includes the Ministry of Corporate Affairs logo and navigation links. The main content area is titled 'Verify DIN/DPIN-PAN Details Of Director/Designated Partner'. It contains a form with the following fields:

- DIN/ DPIN \*: 00180427
- Director's/Designated Partner's Name: PRADEEP GUHA
- Income-tax permanent account number\*: (empty)

There are 'Submit' and 'Reset' buttons at the bottom of the form. A sidebar on the left lists various services like DSC Services, DIN Services, Master Data, LLP Services, e-Filing, etc.

Name of the Director is part of the output, which is to be captured in the output with the given input DIN value. Please note Income-tax permanent account number is not shared in the output so please ignore it.

### Output Format Headers – DIN | Name of the Director

#### Other Points for Consideration:

- Input file has a list of 100 DIN values and the developed module should be capable to ping the above URL, insert the DIN value and fetch the name of the director and store it back in the local system in a sequential manner.
- No limitations on use of technology for scraping information and one can go with Python, Java, NodeJS or any other programming language.
- Candidate can make use of any open source database if needed as there is no compulsion for the same.