GUJARAT TECHNOLOGICAL UNIVERSITY
MCA Integrated - SEMESTER–VIII- EXAMINATION – WINTER 2018

Subject Code: 4480606   **Date: 27-11-2018**

Subject Name: Advanced Python

Time: 02.30 pm to 5.00 pm   **Total Marks: 70**

Instructions:
1. **Attempt all questions.**
2. **Make suitable assumptions wherever necessary.**
3. **Figures to the right indicate full marks.**

Q.1	**(a)**	Do as Directed.	
		i) Write regular pattern/expression which will match Adhar Number (format 9999-9999-9999).	**01**
		ii) Write regular pattern/expression which will match Student Name, which will be in upper case alphabets.	**01**
		iii) Find out the output of: print(re.subn("[yY]es","no", "yes I said yes I will.")).	**01**
		iv) List web address components.	**01**
		v) Define Terms: Global Interpreter Lock(GIL), Django Shell, WSGI	**03**
	(b)	Say TRUE or FALSE with justification.	**07**

i) All REST interactions are stateless.
ii) Feed contain a greater proportion of machine-readable information.
iii) Mashups combine data and services provided by other sites.
iv) The quality of SVG graphics are not lose when they are zoomed or resized.
v) XML is a programming language.
vi) Following Javascript function can be called as add(1) and add(1,2):

```
function add(a,b){
    return a +b
}
```

vii) send() and send(string) methods sends request for GET and POST methods.

Q.2	**(a)**	Discuss searching and matching using suitable example.	**07**
	(b)	Design a Database handler that outputs the contents of Employee(Empno, Name, Gender, Salary) table as HTML Page for browsers.	**07**

OR

	(b)	Discuss processing of CSV file in python using Employee.csv(Empno, Name, Gender, Salary) CSV file.	**07**

Q.3	**(a)**	List advantages and disadvantages of Python extension. List 3 Steps for creating extensions for Python. Discuss any one in detail.	**07**
	(b)	Explain the similarity and dis-similarity between the cursor fetchone(),fetchall() and fetchmany() methods.	**07**

OR

Q.3	**(a)**	Explain apilevel, threadsafety, paramstyle and connect() DB-API module attributes.	**07**
	(b)	Differentiate between	**07**

i) Single and Multithreaded executing in python
ii) thread and threading module

Q.4	**(a)**	Define tweets. List some of the limitations of it. Explain the Twitter service in your own words.	**07**
	(b)	State in your words how urlparse(), urlunparse() and urljoin() functions are similar and different from each other.	**07**

OR

Q.4	**(a)**	What is the use of web crawler? Why we need them? How to parse web content?	**07**
	(b)	i) Compare Basic, Simple and CGI web servers of Python	**03**
		ii) Discuss differences between Twython and Tweepy Python libraries.	**04**

Q.5 **(a)** Discuss basic steps to create "Hello World!" project in Django. **07**

(b) Discuss visualization techniques: Q –Q, Parallel coordinates plot. **07**

OR

Q.5 **(a)** Explain various ways to install Django framework. Write commands: to verify Django installation, change port and change IP of server. **07**

(b) Compare holdout, n-fold and cross-validation methods. **07**

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