

UG 5th Semester Examination 2021

PHYSICS (General)

Paper: SEC-3

[CBCS]

Full Marks: 40

Time: Two Hours

The figures in the margin indicate full marks. Candidates are required to give their answers in their own words as far as practicable.

Attempt all questions. Each question carries 2 marks

1. Which of the following functions is true for plotting **plot2d**?
(A) (expr, rang_x,option)
(B) (rang_x,expr,option)
(C) (option ,rang_x,expr)
(D) (expr,option_x,rang)
2. What dimensional data can be plotted using **plot2d** ?
(A) 2
(B) 3
(C) 4
(D) 5
3. Which command is true for axes
(A) [symbol,axes],axes,noaxes
(B) [axes,symbol]
(C) [symbol,axes]
(D) [axes,symbol],axes,noaxe
4. The keyword **nolegend** is synonym for
(A) [legend,false]
(B) [legend,true]
(C) [false]
(D) [true]
5. Which of the following function is true for simple
(A) simple[simple,nx,ny]
(B) [simple,nx,ny]
(C) [nx,simple,ny]
(D) [ny,simple,nx]

6. Which of the following is correct for displaying title on chart

- (A) `Plt.title=" My Title"`
- (B) `Plt.title()=" My Title"`
- (C) `Plt.title[' My Title']`
- (D) `Plt.title(" My Title")`

7. Which of the following is correct for `gnuplot_pm3d`

- (A) `[gnuplot_pm3d,value]`
- (B) `(gnuplot,value)`
- (C) `[value,gnuplot_pm3d]`
- (D) `[gnuplot_value,pm3d]`

8. What is the command for `pdf_file`

- (A) `[pdf_file,file_name]`
- (B) `[file_name,pdf_file]`
- (C) `[file_pdf,file name]`
- (D) `[file name,pdf file]`

9. Which is correct for `same_xy`

- (A) `[value ,same_xy]`
- (B) `[same_xy, value] same_xy,nosame_xy`
- (C) `[same_xy,value]`
- (D) `same_xy,nosame_xy[same_xy,value]`

10. Which of the following function is true for `grid`

- (A) `[grid,integer,integer]`
- (B) `[grid,integer]`
- (C) `[integer,integer,grid]`
- (D) `[integer,grid]`

11. Which of the following function is true for `iterations`

- (A) `[iterations,value]`
- (B) `[iterations,integer]`
- (C) `[value,iterations]`
- (D) `[integer,iterations]`

12. Which of the following function is true for `logx`

- (A) `[logx,value], logx, nologx`
- (B) `[logy,value],logx,nologx`
- (C) `[logx,value]`
- (D) `[logy,value]`

13. Which of the following function is true for **nticks**
- (A) [nticks,value]
 - (B) [nticks,integer]
 - (C) [value,nticks]
 - (D) [integer,nticks]
14. Which of the following function is true for plot format
- (A) [plot_format,format]
 - (B) [format,plot_format]
 - (C) [plot_format,value]
 - (D) [value,plot_format]
15. Which of the following function is true for plot_realpart
- (A) [plot_realpart,symbol],plot_realpart,noplot_realpart
 - (B) [plot_realpart,realpart]
 - (C) [plot_realpart,symbol]
 - (D) [plot_realpart,realpart]plot_realpart,noplot_realpart
16. Which of the following function is true for ps_file
- (A) [ps_file,file_name]
 - (B) [file_name,ps_file]
 - (C) [ps,file_name]
 - (D) [file_name,ps]
17. Which of the following function is true for gnuplot_postamble
- (A) [gnuplot_postamble,string]
 - (B) [gnuplot_postamble,value]
 - (C) [string,gnuplot_postamble]
 - (D) [value,gnuplot_postamble]
18. Which of the following function is true for opens the pipe to gnuplot used for plotting with the gnuplot_pipes format
- (A) gnuplot_start
 - (B) gnuplot_start()
 - (C) start_gnuplot
 - (D) start_gnuplot()
19. Which of the following function is true for antid
- (A) (expr,x,u(x))
 - (B) (x,expr,u(x))
 - (C) (u(x),x,expr)
 - (D) (expr,u(x),x)

20. Which of the following function is true for derivdegree

- (A) (y,x,expr)
- (B) (x,y,expr)
- (C) (expr,y,x)
- (D) (x,expr,y)

বঙ্গানুবাদ

1. নিচের কোন ফাংশনটি plot2d প্লট করার জন্য সত্য?

- (A) (expr, rang_x,option)
- (B) (rang_x,expr,option)
- (C) (option ,rang_x,expr)
- (D) (expr,option_x,rang)

2. plot2d ব্যবহার করে কোন ডাইমেনশনাল ডেটা প্লট করা যায়?

- (A) 2
- (B) 3
- (C) 4
- (D) 5

3. axes জন্য কোন কমান্ডটি সত্য

- (A) [symbol,axes],axes,noaxes
- (B) [axes,symbol]
- (C) [symbol,axes]
- (D) [axes,symbol],axes,noaxe

4. কীওয়ার্ড nolegend এর প্রতিশব্দ

- (A) [legend,false]
- (B) [legend,true]
- (C) [false]
- (D) [true]

5. নিচের কোন ফাংশনটি simple এর জন্য সত্য

- (A) simple[simple,nx,ny]
- (B) [simple,nx,ny]
- (C) [nx,simple,ny]
- (D) [ny,simple,nx]

6. Chart-এর title প্রদর্শনের জন্য নিচের কোনটি সঠিক

- (A) `Plt.title="My Title"`
- (B) `Plt.title()="My Title"`
- (C) `Plt.title['My Title']`
- (D) `Plt.title("My Title")`

7. নিচের কোনটি `gnuplot_pm3d` জন্য সঠিক

- (A) `[gnuplot_pm3d,value]`
- (B) `(gnuplot,value)`
- (C) `[value,gnuplot_pm3d]`
- (D) `[gnuplot_value,pm3d]`

8. `pdf_file` এর জন্য কমান্ড কি?

- (A) `[pdf_file,file_name]`
- (B) `[file_name,pdf_file]`
- (C) `[file_pdf,file name]`
- (D) `[file name,pdf file]`

9. `same_xy` এর জন্য কোনটি সঠিক

- (A) `[value ,same_xy]`
- (B) `[same_xy, value] same_xy,nosame_xy`
- (C) `[same_xy,value]`
- (D) `same_xy,nosame_xy[same_xy,value]`

10. নিচের কোন ফাংশনটি `grid`-এর জন্য সত্য

- (A) `[grid,integer,integer]`
- (B) `[grid,integer]`
- (C) `[integer,integer,grid]`
- (D) `[integer,grid]`

11. নিচের কোন ফাংশনটি পুনরাবৃত্তির(`iterations`) জন্য সত্য

- (A) `[iterations,value]`
- (B) `[iterations,integer]`
- (C) `[value,iterations]`
- (D) `[integer,iterations]`

12. নিচের কোন ফাংশনটি $\log x$ এর জন্য সত্য

- (A) `[logx,value], logx, nologx`
- (B) `[logy,value],logx,nologx`
- (C) `[logx,value]`
- (D) `[logy,value]`

13. নিচের কোন ফাংশনটি `nticks` এর জন্য সত্য

- (A) `[nticks,value]`
- (B) `[nticks,integer]`
- (C) `[value,nticks]`
- (D) `[integer,nticks]`

14. নিচের কোন ফাংশনটি `plot format` এর জন্য সত্য

- (A) `[plot_format,format]`
- (B) `[format,plot_format]`
- (C) `[plot_format,value]`
- (D) `[value,plot_format]`

15. নিচের কোন ফাংশনটি `plot_realpart` এর জন্য সত্য

- (A) `[plot_realpart,symbol],plot_realpart,noplot_realpart`
- (B) `[plot_realpart,realpart]`
- (C) `[plot_realpart,symbol]`
- (D) `[plot_realpart,realpart]plot_realpart,noplot_realpart`

16. নিচের কোন ফাংশনটি `ps_file`-এর জন্য সত্য

- (A) `[ps_file,file_name]`
- (B) `[file_name,ps_file]`
- (C) `[ps,file_name]`
- (D) `[file_name,ps]`

17. নিচের কোন ফাংশনটি `gnuplot_postamble`-এর জন্য সত্য

- (A) `[gnuplot_postamble,string]`
- (B) `[gnuplot_postamble,value]`
- (C) `[string,gnuplot_postamble]`
- (D) `[value,gnuplot_postamble]`

18. `gnuplot_pipes` ফরম্যাটে প্লট করার জন্য ব্যবহৃত `gnuplot`-এ পাইপ খোলার জন্য নিচের কোন ফাংশনটি সত্য

- (A) `gnuplot_start`
- (B) `gnuplot_start()`
- (C) `start_gnuplot`
- (D) `start_gnuplot()`

19. নিচের কোন ফাংশনটি `antid` জন্য সত্য

- (A) `(expr,x,u(x))`
- (B) `(x,expr,u(x))`
- (C) `(u(x),x,expr)`
- (D) `(expr,u(x),x)`

20. নিচের কোন ফাংশনটি `derivdegree`-এর জন্য সত্য

- (A) `(y,x,expr)`
- (B) `(x,y,expr)`
- (C) `(expr,y,x)`
- (D) `(x,expr,y)`