DERIVADAS DE FUNCIONES COMPUESTAS

1.- $f(x) = (x+2)^2$

2.- $f(x) = (2x-1)^3$

3.- $f(x) = (3x^2 + 2x)^4$

4.- $f(x) = (5x^2 - 3x + 1)^5$

5.- $f(x) = (x + \dfrac{1}{x})^2$

6.- $f(x) = (\dfrac{1}{x^2} + \sqrt{x})^3$

7.- $f(x) = (2x^2 - \dfrac{3}{x})^2$

8.- $f(x) = (\dfrac{5}{x} - \dfrac{1}{\sqrt{x}})^5$

9.- $f(x) = (\dfrac{1}{3}x^3 - \sqrt[3]{x})^3$

10.- $f(x) = (5x^2 - 3x + \dfrac{1}{x})^2$

11.- $f(x) = \sqrt{x+1}$

12.- $f(x) = \sqrt[3]{x-2}$

13.- $f(x) = \sqrt[5]{\dfrac{1}{x}}$

14.- $f(x) = \sqrt{2x^2 + \dfrac{1}{x}}$

15.- $f(x) = \sqrt[3]{\dfrac{1}{x^2} + \dfrac{1}{2x}}$

16.- $f(x) = \sqrt{x + \dfrac{2}{x} - \dfrac{3}{x^2}}$

17.- $f(x) = \sqrt[3]{\left(x + \dfrac{2}{x^3}\right)^2}$

18.- $\sqrt[3]{\dfrac{1}{x} - \dfrac{2}{x^2}}$

19.- $\sqrt[4]{2x^2 - 3x}$

20.- $\sqrt[5]{2x - \dfrac{3}{x} + 2}$

21.- $f(x) = sen\,x^2$

22.- $f(x) = sen^2 x$

23.- $f(x) = sen\sqrt{x}$

24.- $f(x) = sen\left(\sqrt[3]{x^2}\right)$

25.- $f(x) = sen^3 x$

26.- $f(x) = sen\left(x + \dfrac{1}{x}\right)$

27.- $f(x) = sen\left(3x^2 - 5x + 2\right)$

28.- $f(x) = sen\left(\dfrac{1}{x^2} - \dfrac{1}{x}\right)$

29.- $f(x) = sen\left(\sqrt[5]{x^2}\right)$

30.- $f(x) = sen\left(\dfrac{1}{x^2} + \dfrac{1}{x} - x\right)$

31.- $f(x) = \cos\left(3x^2\right)$

32.- $f(x) = 1 + \cos^5 x$

33.- $f(x) = \cos\left(x + \sqrt{x}\right)$

34.- $f(x) = \cos\left(\sqrt{x} + \dfrac{1}{x}\right)$

35.- $f(x) = \cos\left(\sqrt[3]{x} - \dfrac{1}{x^2}\right)$

36.- $f(x) = \cos\left(x^2 - 3x\right)$

37.- $f(x) = \cos\left(sen\,x\right)$

38.- $f(x) = sen^2 x + \cos^2 x$

39.- $f(x) = \cos^2\left(x+1\right) + \cos^2 x$

40.- $f(x) = \cos\left(\cos x\right)$

41.- $f(x) = \ln^2 x$

42.- $f(x) = \ln x^2$

43.- $f(x) = \ln\left(sen\,x\right)$

44.- $f(x) = \ln\left(\cos x\right)$

47.- $f(x) = \ln\left(\sqrt[3]{x^2}\right)$

48.- $f(x) = \ln\left(\dfrac{1}{x} + \dfrac{1}{x^2}\right)$

49.– $f(x) = \ln(\ln x)$

50.– $f(x) = \ln(1 + senx)$

51.– $f(x) = e^{senx}$

52.– $f(x) = e^{(x^2+1)}$

53.– $f(x) = e^{\cos x}$

54.– $f(x) = e^{senx + \cos x}$

55.– $f(x) = e^{\left(x^2 + \frac{1}{x}\right)}$

56.– $f(x) = e^{(2x^2 + x + 1)}$

57.– $f(x) = e^{(x + \ln x)}$

58.– $f(x) = e^{\left(\sqrt{x} + \frac{1}{x}\right)}$

59.– $f(x) = e^{\left(\frac{1}{x} + \frac{1}{x^2}\right)}$

60.– $f(x) = e^{(senx + \ln x)}$

61.– $f(x) = (senx + \cos x)^2$

62.– $f(x) = sen\left(e^x + \ln x - \sqrt[5]{x^3}\right)^2$

63.– $f(x) = (2\cos x + 3senx)^3$

64.– $f(x) = (\ln x + x^2)^2$

65.– $f(x) = \ln(x + \sqrt{x})$

66.– $f(x) = \dfrac{1}{e^{x^2+x}} - \dfrac{1}{\ln x}$

67.– $f(x) = \sqrt{senx + \cos x} + \ln(senx)$

68.– $f(x) = \dfrac{1}{\sqrt{senx}} + \dfrac{1}{\sqrt{\cos x}}$

69.– $f(x) = \left(\cos x + \dfrac{1}{senx}\right)^3$

70.– $f(x) = (sen^2 x + \ln^2 x)^2$

71.– $f(x) = sen(\ln x^2)$

72.– $f(x) = \ln(\cos^2 \sqrt{x})$

73.– $f(x) = sen(\sqrt{\ln x^2})$

74.– $f(x) = e^{\cos(\ln x)}$

75.– $f(x) = \cos e^{senx}$

76.– $f(x) = \sqrt{sen(\ln^3 \sqrt{x^2})}$

77.– $f(x) = \left[sen(x^2 + 1)^2\right]^3$

78.– $f(x) = \cos^2\left[e^{(x + \cos x)^2}\right]$

79.– $f(x) = sen\left[\cos(\ln x^5)\right]$

80.– $f(x) = (sen^2 x + \ln x)^2$

81.– $f(x) = sen\left[\ln(sen\sqrt{x+3})\right]$

82.– $f(x) = (e^{senx} + x)^2$

83.– $f(x) = e^{(x + senx)}$

84.– $f(x) = e^{(\cos x + senx)}$

85.– $f(x) = sen(\ln\sqrt{x})$

86.– $f(x) = \sqrt{sen(\ln x^2)}$

87.– $f(x) = \sqrt[3]{(x + \ln x)^2}$

88.– $f(x) = \dfrac{1}{\sqrt{x^2 + senx}}$

89.– $f(x) = (sen^2 x + \ln^2 x + x^2)^2$

90.– $f(x) = sen^3\left(\sqrt{e^{2x} + x^3}\right)$

91.– $f(x) = \dfrac{e^{senx}}{x^2 + x}$

92.– $f(x) = senx^2 . \ln(senx)$

93.– $f(x) = sen^2 x . senx^2$

94.– $f(x) = \ln(senx) . sen(\ln x)$

95.– $f(x) = \dfrac{senx^3}{sen^3 x}$

96.– $f(x) = \ln x^2 . \ln^2 x$

97.– $f(x) = \sqrt{\ln x} . \ln\sqrt{x}$

98.– $f(x) = \sqrt{x.senx}$

99.– $f(x) = (x.\ln x)^3$

100.– $f(x) = \left(\dfrac{x}{senx}\right)^3$