Numpy: (DAY - D) (10) agains. (1,01,0) square gor L) Nompy is a fordamental Ubany for specific Computing in python. LI of prousdes support for arrays and matrices? ! psp install numpy ((cy)) = 100 . gm LI create amon using numpy Import numpy asmp arri = hp. array ([1,2,3,4,5]) -1 (reale to 10 array Print (am 1) Print (type (arr 1)) fort prois of wholiting is Print (arri. shape) (is , tal , parely) toh? # 'ant = np.anay (C1,213,4,67) arri. restape (1,5) eate a-d array ($C(C_1/2/3)$, $C(U_15,U)$) A Create 2-d array deimoir.net 10/10 PART (ami) Print (am. 8hape)

Arrange 0 to 10 number with difference 2 1 ais acchape to (5,1) mp. avange (0, 10, 2). reshape (5,1) of it is a perdamental the head to be thought to see the control of of FRU II as an element. By mahn, or singles consuming the ! Lymor mothing of I will. mp. ones ((3,4)) or Create Identity maths. du no Almon + white ((e, r, E, E, 13) pomo : ga = , ms Palas (Cara) Print (type (an i)) of Attributes of Money array (Spide . Ivio) toil Print (odray: In1, any 3) hours dd = 1 mm. -1 ronky mahr an . Shape (2,11) igenery . / me, — dimension am, ndm andype (dataly). dataly) tono p-c storo Lucia in a mos ___ byter. an . Glentize (100) Just (squis in a) have

Numpy Vectorized Operations! Point (am Challett) arri = np. array ([1,213,4]) salation J. ans = np. anay (C5,6,7187) idea who perh whork A1 = an1 + an2 coil to, e) me $-12 = arr_1 - arr_2$ (m) tool () 3) A3 = amia am2 Lagran J Ay = ani/anie LEP 18 m. 9 Universal function . · (dquiria), ly remote Square root: - inp. sqrt (anr) work. du Exponential: npesso (imperep (am))

Sine inperm rip elstrium).

tog inperm rip log (am)

tog inperm rip log (am) Array sticing & indexing

(mo) nother (chis, c), (=18, e))

array ([1,2,3], [4,5,6], (=18, e)) Print (an)

Print (am (11, 112)) C COICO, CE, ADY (MICH SO) COICO D (+ (if the 2)) the said Modery Array elements. 001 = 60107 wb Print (am) sinc firms = 51. [[100, 1, 3] ema ema [us, s, b] wirol inco in wh. (=48,9]] Statistical Concepts mean 1- mp. mean (ama) 1/p. . qui is standard deveration 1- np. std (arr) normalised data :- 788. (Com - mean)

Varionce :- mp. Var (an) median (am) the median (am)

Logical Speakon

data = np. anay ((11213, 415,61=7,619,10))

data = p. anay ((11213, 415,61=7,619,10))

data = (data > = 5) & (data < = 8)]. by

(11213, 415,61=7,619,10)