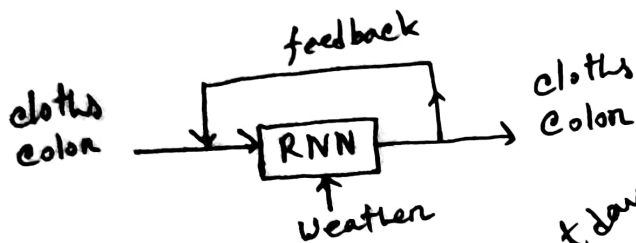# Quiz 2

Name: Saunov Podder

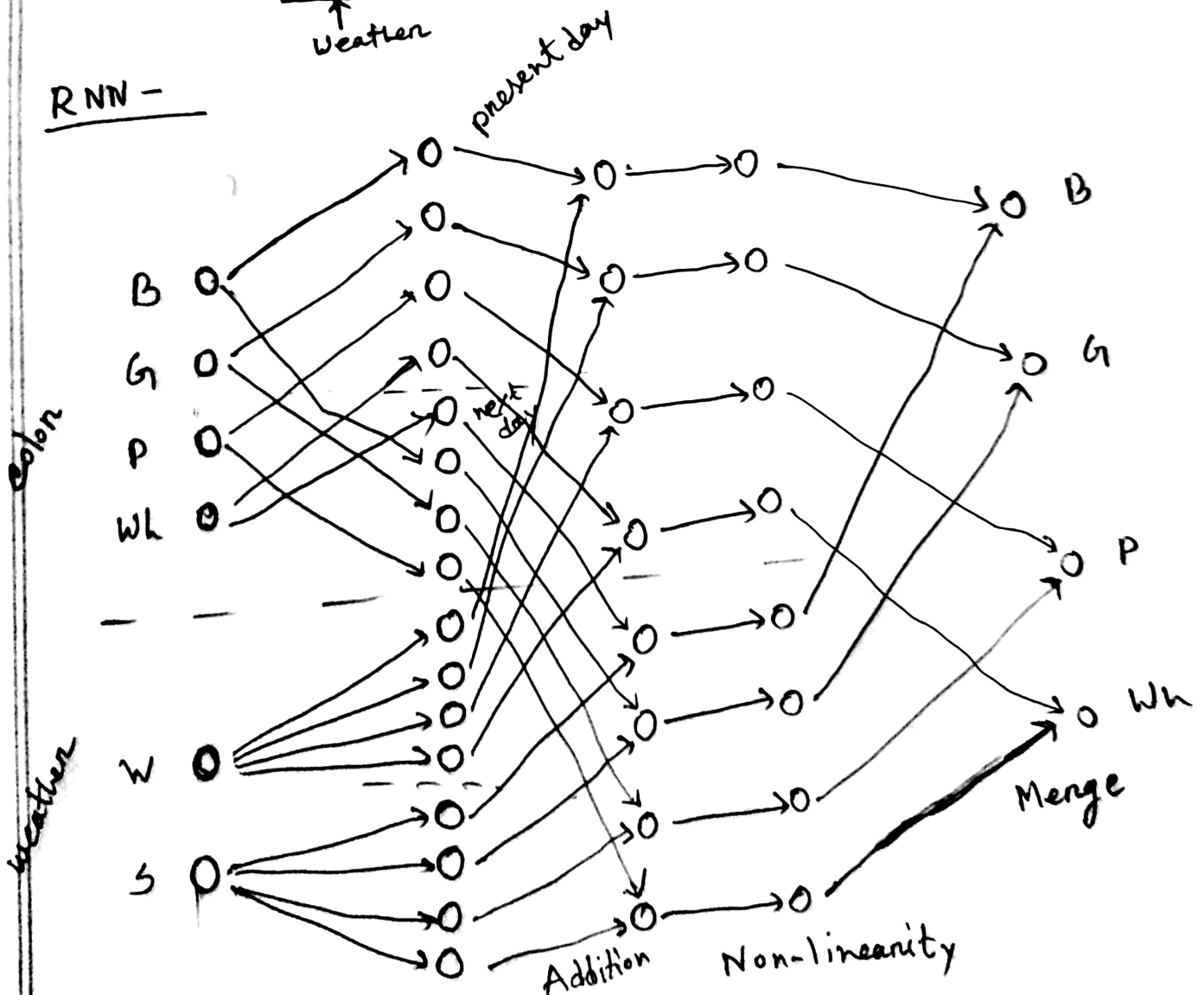ID: 18321046

Section: 02

Answer to the Question No. 1

cloths.
 color input variable sequence = {black, gray, pink, white}

$$B, G, P, Wh$$

weathe input variable = {swindy, sunny}

$$W, S$$

feedback

RNN —

present day

B

G

P

Wh   Merge

color

weather

W

S

Addition   Non-lineanity
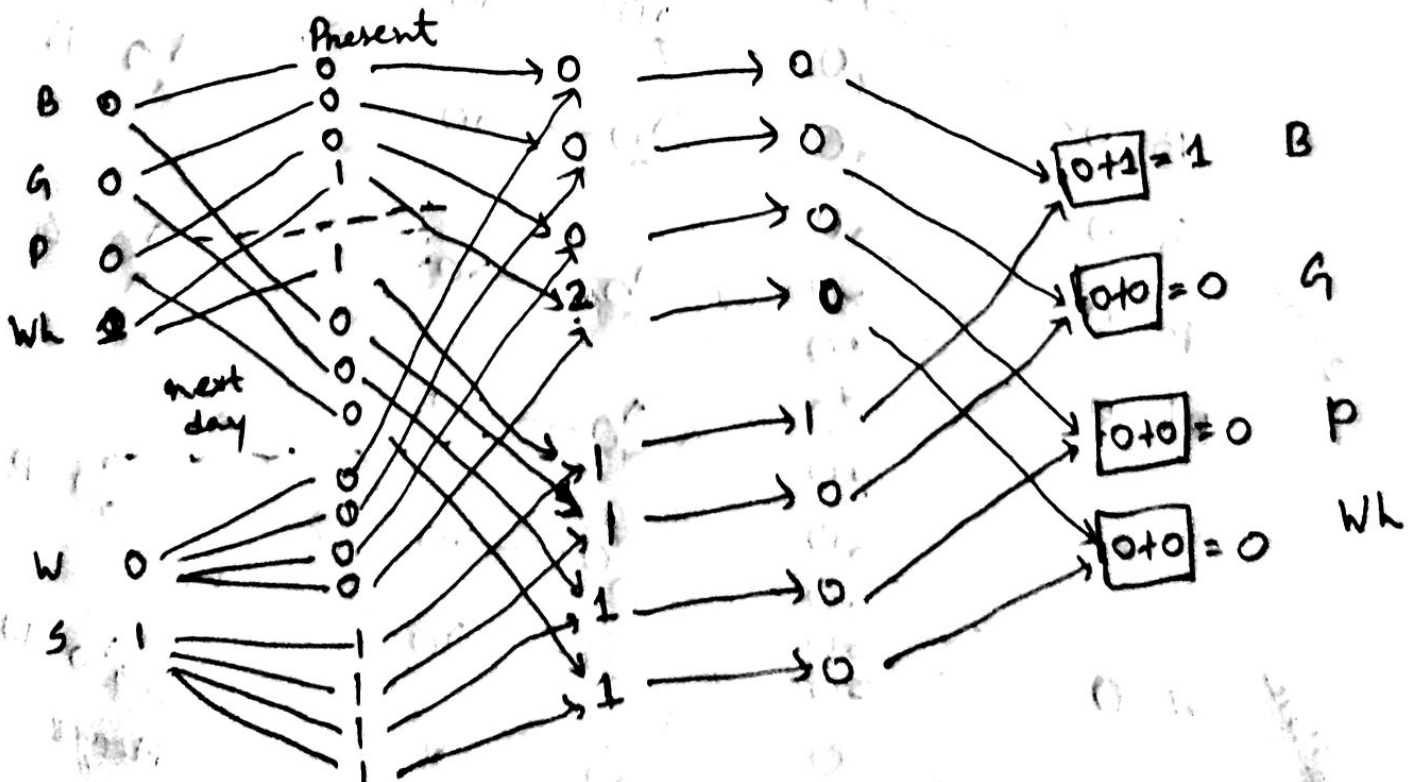
next day

cloths color → RNN → cloths color

weather

all the matrices are —

$$B = \begin{bmatrix} 1 \\ 0 \\ 0 \\ 0 \end{bmatrix} \qquad G = \begin{bmatrix} 0 \\ 1 \\ 0 \\ 0 \end{bmatrix} \qquad P = \begin{bmatrix} 0 \\ 0 \\ 1 \\ 0 \end{bmatrix} \qquad Wh = \begin{bmatrix} 0 \\ 0 \\ 0 \\ 1 \end{bmatrix}$$

$$S = \begin{bmatrix} 0 \\ 1 \end{bmatrix} \qquad W = \begin{bmatrix} 1 \\ 0 \end{bmatrix}$$

We want to wear black on next day. So, today's condition's are sunny and wearing white.

So, here we can observe that, when we take sunny day and white cloths and for next day output we get black, which is in sequence.

Also, we can take pink and windy, and we get pink.