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Problem 1
(a). / X=1 {(WLLL), (LWLL), (LLWL), (LLLW)}
         X=2 (WWLL), (WLWL), (WLLW), (LWWL), (LWLW), (LLWW)
       x=3 ((WWWL), (WWW), (WLWW), (LWWW))
  R=
        x=4 \{(WWWW)\}
         x=0 {(LLLL)}
(b) PDF fr = (4)(1) x (1) 4-x
      1 \times = 1 \quad (\frac{4}{1})(\frac{1}{2})'(\frac{1}{2})^3 = 0.25
      x=2 (\frac{4}{2})(\frac{1}{2})^{2}(\frac{1}{2})^{2}=0.575

x=3 (\frac{4}{2})(\frac{1}{2})^{3}(\frac{1}{2})=0.25
       \chi = 4 \quad (4) \left(\frac{1}{2}\right)^4 \left(\frac{1}{2}\right)^6 = 0.06 \times 10^{-10}
       x = 0 (4)(1)^{\circ}(1)^{4} = 0.0615
           ( X L D D
LC).
             05441 0.0625
            16x12 0.065+0.5=0.315.
CDF FR= 24x43 0.0645+0.45+0.375=0.6875
            3 < x < 4 0.0625 +0.25 +0.375 + 0.25 = 0.9375
             ×74 0.0625 +0.45 +0.375 +0.25 + 0.0625 =
(d) FR(10)
1.1 \times 10 1.1 \times 7/4 1.1 \times 7/4 1.1 \times 7/4
Because when x=10. X belongs to X7/4 which is the case
that FR=1
Problem 2
(a) ((HHH), (HTH), (HTH), (HTT), (TTH), (TTT))
                   First tosshashead.
                  = {(HHH), (HHT), (HTT)}
                                 Two head occurs
Pr = \frac{2}{4} = \frac{1}{4}
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	(b). : first roll was less than 5		
firstr		and more filled travel lines, was lower parties as a proposition of the relative parties are consti-	
	5456123451234123		
second	[101]		
	6 6	kerkusakkurupetar upo gamerrusa lanetario suriatario estata territorio estata estata estata estata estata esta	
	: Pr = 65 = 1	Define Human Chapter of Green process republicant from Event and according to	
	4(6) 4		
first 6 \	$[.2.3.4]$ Second $\{[1,2,3,4,5,6]$		
	(C).	restructiva in dell'in, un halle sort inguazza soni salle, più agri en grune, un clies sen	
first rol	11 2 3 4 5 6	, menopund the afficient composition on "NECE MENOPERS AND THE parties had	
	234131212345	procupation for the form where every private law and the first section of the contract of the	
Second roll	(5) (4) (8) (2) (1)	Salar Control of the	
S COMOT TON		Maring Spirit State Communities (1987) (1987) Annual Communities (1987) (1987) Annual Communities (1987) (1987) Annual Communities (1987) (1987) Annual Communities (1987) (1987) (1987) Annual Communities (1987) (
	6 5 6 4 5 6 3 5 6 6		
	: $P_r = \frac{4}{6(5)} = \frac{4}{30} = \frac{2}{15}$ Same as first	ethydigenia agailachau a sing etholerada na digeach ann a' gholl an bhail a	
	$rst \in \{1,2,3,4,5,6\}$ Second = 6-1=5		
	$(d), x^{2}-x+\frac{2}{9}<0$ $9x^{2}-9x+2<0$	behande vir (O) (A) rettalskande mage merskalled geself (A) de (O) as mis em (A) an v	
	13×1)(3×-2)<0	promojentalizaciono/commenzacionichemicacionichemicacioni	
	$\therefore \frac{1}{2} \langle x \langle \frac{2}{3} \rangle = \frac{1}{3} \cdot x = \frac{1}{2} \cdot P(x > \frac{1}{2}) \cap P(\frac{1}{2} \langle x > \frac{1}{3}) = \frac{1}{3} \cdot \frac{1}{2}$		
	2 1	t del gar formante de monte de describero de la Productivo de la Titologo de Senta de Constante de Senta de Se	
	$Pr = \frac{3^{2}}{2} = \frac{6}{1} = \frac{1}{2}$		
			
	(e).	we then were up to the control of th	
	A(upper half) = $\frac{1}{2} \pi r^2 = \frac{1}{2} \pi (4^2) = 8\pi$		
	A(greater than 2 \(\Omega\) upper haif) $= 8\overline{7} - \frac{1}{2}\(\omega(1)^2) = 8\overline{7} - \omega(2) = 6\overline{7}$		
	$Pr = \frac{6\pi}{C\pi} = \frac{3}{4}$	der verster verster verster der Sie der der verste Sie	
	87 8 4		



	Problem 3	La grand francisco por de		
	x for number of comect answered questions			
	Pr(X=6)=(8 (0.75)6 (1-0.75)8-6=(87(0.75)6(0.25) = 0.3115			
transition (D-1 V-6 1 V-2 for each -11-1			
	$=(\frac{4}{2})(0.75)^{3}(1-0.75)^{4-3} \cdot (\frac{4}{2})(0.75)^{3}(1-0.75)^{3}$	1) 4-3		
first jury	$= \overline{L(\frac{4}{3})(0.75)^{3}(0.25)}^{2} = 0.1780$	Second jung		
	:.Pr = 0.1780 0.3115			
	0.511.5			
	Problem 4	2 51		
	(a). Pr(complete) = Pr(incomplete) = 1	incomplete - QU		
	Pr(Q() from complete) = \frac{1}{52}			
	Pr(Q() from incomplete) = \(\frac{1}{51} \)	complete -QU52		
	$Pr = \frac{1}{2}(52) - 0.495$	1		
	七(52)+七(5)	1 4		
	(b), Pricomplete) = Princomplete) = 1	/Incomplete-queel		
	Priqueen from complete) = 1 (12)			
	Priqueen from mcomplete)===================================			
	$Pr = \frac{1(52)}{1(4) + 1(51)} = 0.495$	complete-queen		
		1 52		
	(c). Pricomplete) = Princomplete)==	/incomplete - A() 51		
	Pr(AV from complete) = 1(52)			
	Pr (A() from in complete) = $\frac{1}{2}(\frac{1}{51})$ $\therefore Pr = \frac{\frac{1}{2}(\frac{1}{52})}{\frac{1}{2}(\frac{1}{51})} = 0.495$	complete - Als 52		
	$P_r = \frac{1}{1}(51) = 0.495$			
	之(式)+之(可)	1 41 = 3 51 51		
12 Table 1	(d). Pr(complete) = Pr(incomplete) = 1	incomplete - Ace		
	Pr(ace from complete)= = = = = (52)			
	Priace from incomplete) = + (4-1) = + (3)	1 52		
	$P_{r} = \frac{\pm (51)}{\pm (51) + \pm (51)} = 0.567$	complete - Ace		
	七(5元)+七(5元)			



Problem 5

(b) Pr(don't get shoot for first time) = $\frac{b-1}{b} = \frac{4}{5} = \frac{2}{5}$ Pr(don't get shoot for first time 1 get shoot for second time) = $\frac{2}{5}(\frac{2}{b-1}) = \frac{1}{5}(\frac{2}{5})$

$$\therefore \Pr = \frac{\frac{1}{3}(\frac{2}{5})}{\frac{2}{3}} = \frac{2}{5}$$

(c). For (a), it doesn't change the answer, because the order of bullets doesn't matter in this case.

For (b), don't get shoot for first time excluding the possibility of the position before the second bullet Dridon't get Shoot for first time) remain unchanged.

Dridon't get shoot for first time) remain unchanged.

$$Pr = \frac{\frac{1}{3}(\frac{1}{4})}{\frac{1}{3}} = \frac{1}{4}$$

