

5)	(0, -1, 2)	(0, 1, 0)	(2, -1, 0)	(1, 2, 3)	(2, 2, 2)	P	$\frac{5}{3}\sqrt{3}$	-	-
----	------------	-----------	------------	-----------	-----------	-----	-----------------------	---	---

$$\delta: \begin{cases} -b+2c+d=0 \\ c+d=0 \\ 2a-b+d=0 \end{cases} \begin{cases} b=-d \\ c=-d \\ a=-d \end{cases} \quad x+y+z-1=0 \quad r: (1, 2, 3) + \delta(1, 0, -1) = (1+\delta, 2, 3-\delta)$$

$$r \cap \delta: 1+\delta + 2+3-\delta - 1 = 0 \Rightarrow 5=0 \Rightarrow r \parallel \delta$$

$$s \perp \delta: (1, 2, 3) + \delta(1, 1, 1) = (1+\delta, 2+\delta, 3+\delta) \cap \delta \Rightarrow 6+3\delta-1=0 \quad \delta = -5/3$$

$$\Rightarrow P' = (-2/3, 1/3, 5/3) \quad PP' = (5/3, 5/3, 5/3) \Rightarrow d_{P\delta} = \frac{5}{3}\sqrt{3}$$