1.If u =(5,0,-3,7) a=(2,1,-1,-1), what is the value of $||proj_a u||$

  (a)6/7   (b)6/√7   (c)20/7   (d)20/√7

2. if $||v||=2$ and $||w||=3$, then what is the largest possible value for $||v-w||$

  (a)1   (b)2   (c)5   (d)6

3. which of the following pair of vectors is orthogonal

  (a)u=(0,0,-1), v=(1,1,1)   (b)u=(2,3), v=(5,-7)   (c)u=(6,1,4), v=(2,0,-3)   (d)u=(1,-5,4), v=(-1,5,-4)

4. the angle between u=(2,-1,-1) and v=(3,0,2) is

  (a)zero degree   (b)orthogonal   (c)obtuse   (d)acute

5. which one of the following does not make sense mathematically for the 3 vectors u, v, w

  (a)u · (v · w)   (b)u · (v+w)   (c)(u · v)-$||u||$ (d)(u · v)-k