

Name:

Student number:

## Introduction to English for Scientific Communication:

### Homework 1 (Articles)

Due: Tuesday 15<sup>th</sup> April (before class)

In each sentence below, the place in which “\_\_\_\_\_” appears may require an article. If an article is needed, please write in the appropriate one. If none is needed, please write “none”.

1. This appears to be equivalent to \_\_\_\_\_ ordinary second quantization formalism.
2. Synchronous activity in \_\_\_\_\_ brain seems to be generated and maintained by interactions among \_\_\_\_\_ neurons.
3. \_\_\_\_\_ quantity  $h$  has \_\_\_\_\_ interesting physical interpretation.
4. In \_\_\_\_\_ Sec. 4, we reduce this set of equations to \_\_\_\_\_ system of \_\_\_\_\_ simpler equations.
5. In this case, \_\_\_\_\_ operator of this kind does not exist.
6. We treat \_\_\_\_\_  $\nu$  and  $d$  as \_\_\_\_\_ continuous functions and therefore express them as  $\nu(x, t)$  and  $d(x, t)$ .
7. We plot \_\_\_\_\_ coupling strength as \_\_\_\_\_ function of  $y$  in \_\_\_\_\_ Fig. 1(a).
8. This type of behaviour is seen with regard to \_\_\_\_\_ eigenvector  $v_1$  or  $v_2$ .
9. \_\_\_\_\_ shading of \_\_\_\_\_ circle positioned at \_\_\_\_\_ centre of each cell indicates population of that cell.
10. In each case, only \_\_\_\_\_ one pair of \_\_\_\_\_ solutions is stable.
11. This is one of \_\_\_\_\_ key concepts in \_\_\_\_\_ field of \_\_\_\_\_ number theory.
12. In this paper, we consider \_\_\_\_\_ infinitesimal deformation of \_\_\_\_\_ regular arrangement of \_\_\_\_\_ particles.
13. As \_\_\_\_\_ result of \_\_\_\_\_ growth of these cells, \_\_\_\_\_ new structures are formed.
14. We choose \_\_\_\_\_  $\hbar \omega_D$  as \_\_\_\_\_ energy unit.

15. \_\_\_\_\_ above results provide \_\_\_\_\_ clear understanding of the resonant behaviour.
16. Most of \_\_\_\_\_ change occurs in \_\_\_\_\_ first half of the operation.
17. We consider \_\_\_\_\_ simple equation  $d \tau (x)/dx = f(x)$ , where \_\_\_\_\_  $f(x)$  is \_\_\_\_\_ second function appearing in \_\_\_\_\_ (3.4).
18. In this case it is most convenient to use \_\_\_\_\_ cylindrical coordinates.
19. This treatment is analogous to \_\_\_\_\_ standard algebraic treatment of the harmonic oscillator.
20. One of \_\_\_\_\_ main results is given in \_\_\_\_\_ next section.