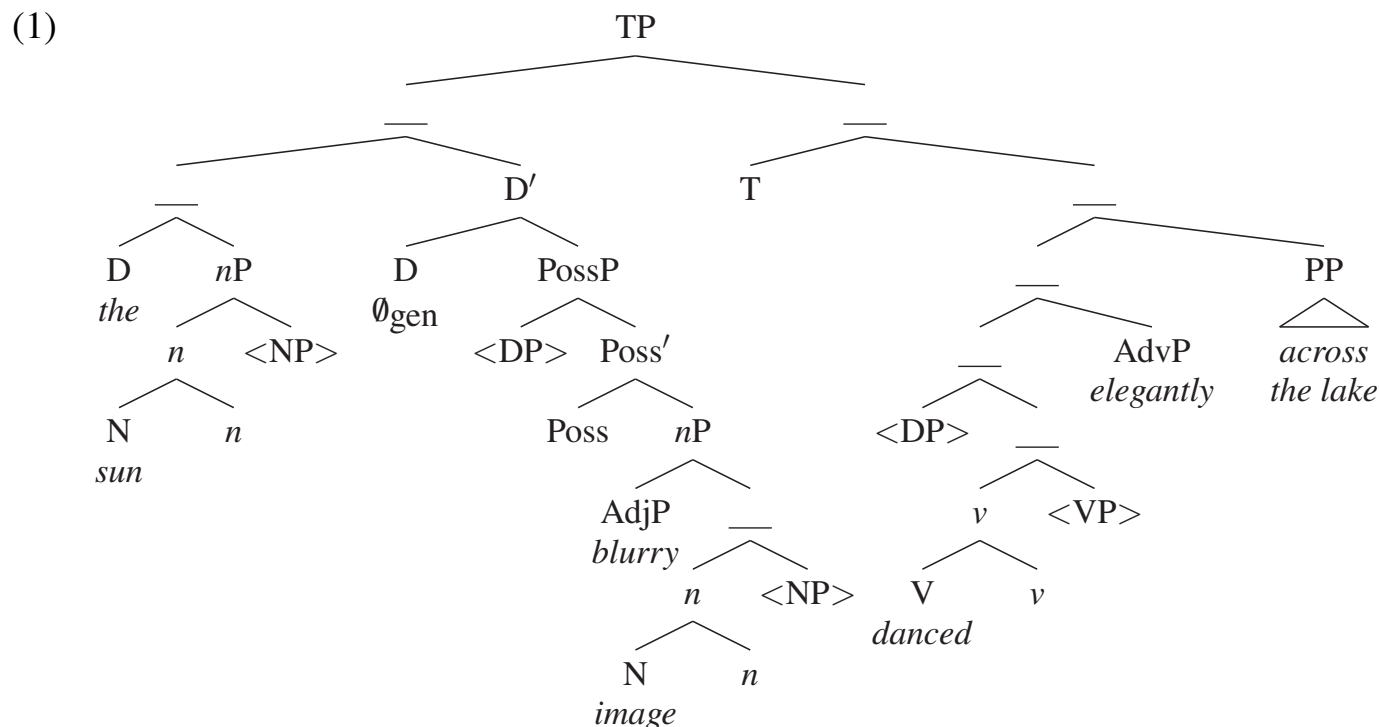1. [4] Fill in the missing labels for the nodes in the tree below. Use the standard "X-bar" notation (e.g., NP, v', etc.).

(1)

```
                                TP
             ___                       ___
        ___          D'           T          ___
     D     nP     D     PossP           ___        PP
    the          Øgen                              AdvP   across
         n  <NP>      <DP>  Poss'         ___    elegantly  the lake
        N    n           Poss   nP      <DP>  ___
       sun                                  v   <VP>
                       AdjP   ___
                      blurry                V    v
                            n   <NP>      danced
                           N    n
                          image
```

2. [6] Yes or No. In the sentence for which the structure is given in (1)...
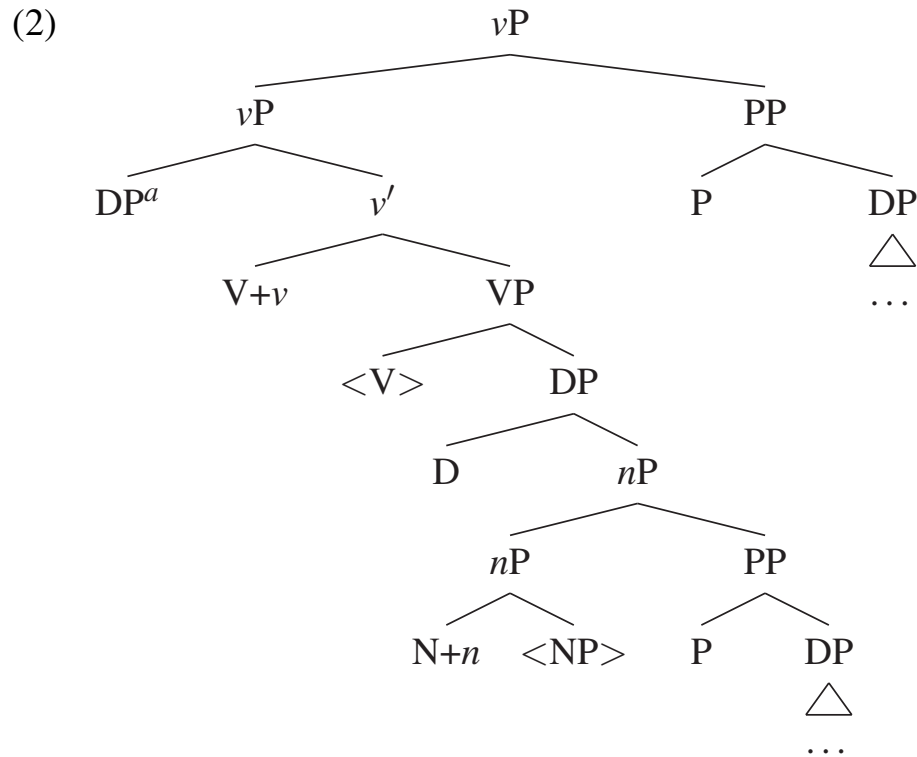
(a) Does *the sun* have nominative case?   _____

(b) Is *blurry* a specifier?   _____

(c) Is *elegantly* an adjunct?   _____

(d) Is *blurry* a head?   _____

(e) Is *the sun's image* an Experiencer?   _____

(f) Is the Hierarchy of Projections the motivation for Merging Poss and *n*P? _____

3. [1] Circle one. The verb shown in (1) is...

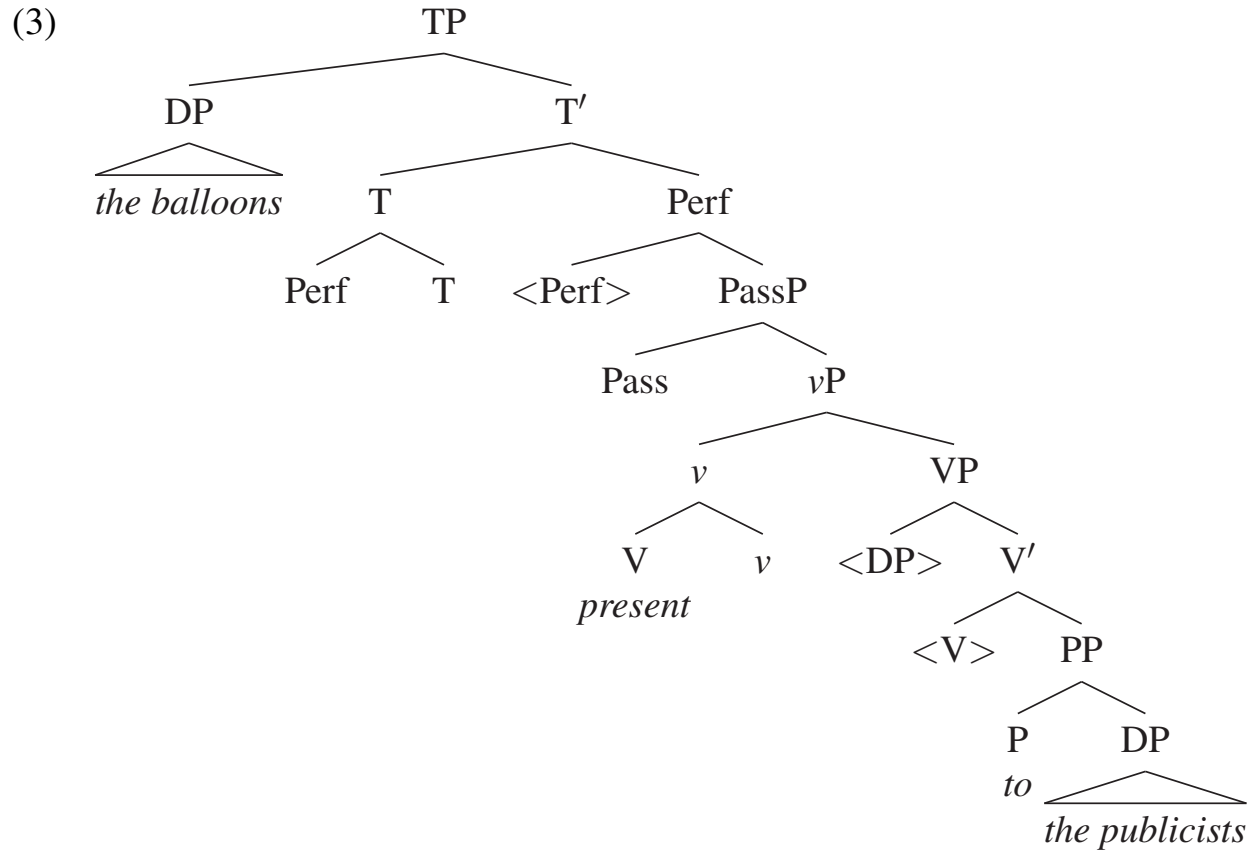<div align="center">ditransitive / transitive / unergative / unaccusative</div>

5. [1] θ-role. Name the θ-role that *the sun* has in (1).   _____

6. Suppose we start building a structure for a sentence, and at a certain stage we wind up with a *v*P as shown (abstractly) below in (2).

(2)

```
                              vP
              ┌───────────────┴───────────────┐
             vP                               PP
        ┌─────┴─────┐                    ┌─────┴─────┐
      DPᵃ          v'                    P           DP
              ┌─────┴─────┐                          △
            V+v          VP                          …
                    ┌─────┴─────┐
                  <V>          DP
                          ┌─────┴─────┐
                          D           nP
                                ┌─────┴─────┐
                               nP          PP
                          ┌─────┴─────┐  ┌──┴──┐
                        N+n   <NP>    P      DP
                                             △
                                             …
```

(a) [1] Name a θ-role that DPᵃ could have. _____

(b) [1] How many times was Adjoin used? (Include the two that attach V to *v* and N to *n*.)

_____

(c) [1] How many [*u*D*] features were there—total—in these lexical items (not including the T that will be added later) initially?

_____

(d) [1] Which of the following three sentences might plausibly include the *v*P in (2)?

1. The librarian introduced the pupils to the artist with enthusiasm.
2. The artist painted the door to the stage with enthusiasm.
3. The publicists photographed the door with their phones with enthusiasm.

2

7. Suppose you had a sentence with the abstract structure given below in (3). I have provided the pronunciation of some of the lexical items.

(3)

```
                        TP
              ┌──────────┴──────────┐
             DP                     T'
          ┌───┴───┐          ┌───────┴───────┐
      the balloons  T                        Perf
               ┌────┴────┐          ┌──────────┴──────────┐
             Perf        T       <Perf>                  PassP
                                              ┌────────────┴────────────┐
                                            Pass                        vP
                                                             ┌───────────┴───────────┐
                                                             v                       VP
                                                        ┌────┴────┐          ┌────────┴────────┐
                                                        V         v       <DP>               V'
                                                     present                         ┌─────────┴─────────┐
                                                                                   <V>                   PP
                                                                                              ┌───────────┴───────────┐
                                                                                              P                       DP
                                                                                             to                  ┌────┴────┐
                                                                                                            the publicists
```

(a) [1] The verb in (3) (in its basic form, disregarding the passive) is . . .

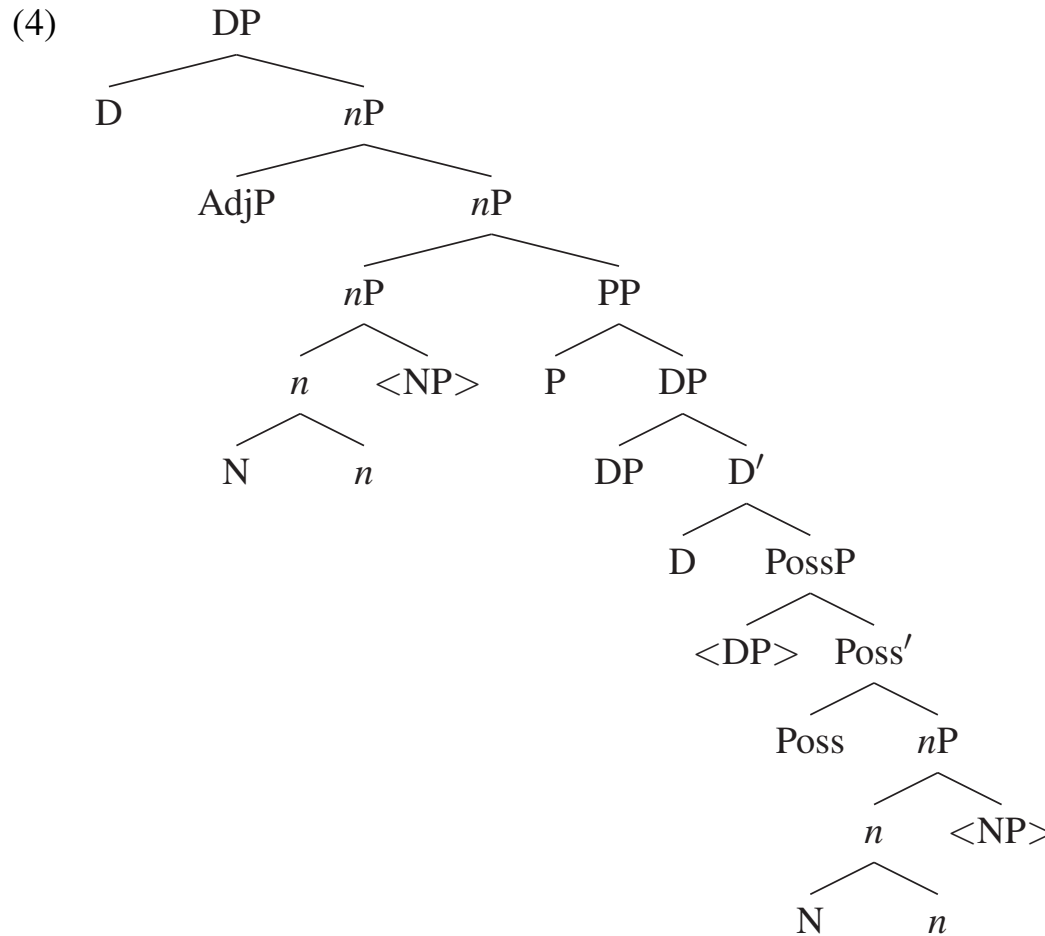<div align="center">ditransitive / transitive / unergative / unaccusative</div>

(b) [1] Draw arrows showing, for things that moved, where they moved from and to.

(c) [1] Write a sentence that this would be the structure for.

_____

(d) [1] What was the motivation to Merge T' and the DP (*the balloons*)?

_____

(e) [1] *v* started with a [*u*Infl:] feature. What value does it have at the end?

_____

8. [2] DP Structure. Answer the questions below about (4). Assume that if no internal structure is *shown* for a DP, then the DP *has* no internal structure.[1]

(4)

```
                    DP
            _____
           D                  nP
                      _____
                    AdjP                 nP
                              _____
                            nP                   PP
                      _____        _____
                     n     <NP>          P          DP
                  _____                      _____
                 N       n                    DP         D′
                                                      _____
                                                     D      PossP
                                                        _____
                                                     <DP>      Poss′
                                                            _____
                                                          Poss        nP
                                                                  _____
                                                                 n       <NP>
                                                              _____
                                                             N       n
```

(a) [1] Both DPs inside (4) have their [*u*case:] feature valued and checked. Draw an arrow from the head that checks each case feature, labeled with the name of the case.

(b) [1] Write an English DP that (4) could represent

_____

---

[1]Hint: what kind of DP has no internal structure?