LS11 **Seed Plant Worksheet**

1. Plant summary: Complete the table with check marks in appropriate boxes

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| Plant | Dominant Stage | Produces Spores? | Has vascular tissue?  | Produces Seeds? | Produces pollen?  | Produces Fruit?  | Produces flowers?  |
| Algae |  |  |  |  |  |  |  |
| Mosses |  |  |  |  |  |  |  |
| Ferns |  |  |  |  |  |  |  |
| Gymnosperms |  |  |  |  |  |  |  |
| Angiosperms |  |  |  |  |  |  |  |

1. Give an example of a plant in each of the above categories.
2. What is an advantage of having sporophyte as the dominant phase?
3. Discuss the evolutionary advantages of seeds.
4. Draw and label the three main parts of the seed.
5. After an egg is fertilized describe how a seed is formed (what parts become what).
6. Label the parts of the flower: Stigma, stamen, anther, pistol, style, pollen tube, ovary, ovule.
7. Petals are not directly involved in sexual reproduction of a flower so they could be considered accessory structures. How do they help with sexual reproduction?
8. What are some strategies used by flowers to ensure they are pollinated by a vector?
9. What are some strategies flowers pollinated by wind use?
10. Fruit can be very energy intensive for the plant to make. Why would a plant do this?
11. What are some methods of seeds dispersal?