**Revision Sheet Polymers – Plastics & Proteins Gee – thanks, Miss!**

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| 1. | Addition polymers | How?  What must be present in monomer? |
| 2. | HDPE –vs- LDPE | Two questions on this comparison (one in IP). Know uses, properties, and how STRUCTURE explains properties |
| 3. | Glucose/starch/celluslose | Type of rn? Join? |
| 4. | Thermosetting –vs- thermoplastic | What’s the difference? How does this affect their uses? |
| 5. | Polyesters | Bond type? Necessary functional groups?  Properties? IM bonding? compare MP and elasticity to nylon |
| 6. | Nylons | Bond type? Necessary functional groups?  Properties? IM bonding? Compare MP and elasticity to polyester |
| 7. | Special nylons | Properties and uses  Nylon 6,6 nylon 6,10 Kevlar |
| 8. | polypeptides | Identify acid residues.  Draw polypeptide given amino acids |
| 9. | 1°, 2° and 3° structure of proteins | Diagrams, types of bonds |
| 10. | Glass transition temp | What is it? Can you predict it from structure?  Car dashboard. |
| 11. | Cleaving proteins | Identify primary structure given smaller chains resulting from treatment with enzyme.  Like examples. |
| 12. | Response to stimulus | Plastics/bioplastics/recycling  Page long response  Use chemistry NOT SOSE  Advantages & disadvantages |
| 13. | Tertiary structure | Predicting possible acid residues that could result in the shape given.  Multiple answers possible. |