**K-12 Student Outreach**

**Concrete for Kids – Corpus Christi Branch**

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| **1. Section, Branch** | Corpus Christi Branch |  |
| **2. Section/Branch Size** | Medium |  |
| **3. Project Contact** | Carlos Martinez, PE | |
| Name | Carlos Martinez | |
| Phone Number | 361-739-1020 | |
| Email | carlos@pocca.com | |
| **4. Project Category** | K-12 Student Outreach | |
| **5. Project Description** | Introduce concrete as a material and explain its importance. | |
| **6. The Process**  (What you did, When and How) | We give a short 15-minute interactive PowerPoint presentation to discuss WHAT is concrete by showing samples of aggregate, sand, cement, and water, WHERE and HOW it is used, and WHO designs it. We then allow the kids to mix concrete (quikrete) in a bowl and pour a concrete cylinder (test cylinder). We cure the cylinder overnight and the students take theirs home the next day. | |
| **7. Those in Charge** (Committee, Task Committee, Etc.) | Corpus Christi Board and committee members. | |
| **8. Time Frame**  (When Started, When Completed) | Spring semester or Science Summer Camps, two days. | |
| **9. Success Factors**  (The Parts that Worked Really Well) | Allowing the kids to see how a powder and water combine to become hard. | |
| **10. Setback Factors**  (The Parts that did Not Work Well) | We began with actual aggregate, cement, sand, water. But that got too messy so we started using Quikrete for ease. | |
| **11. Creativity**  (This is something off the wall that we did) | We told the teacher to ask the students how they will use the concrete cylinder. | |
| **12. Administration**  (What was most Important?) | Getting a local Geotech lab to sponsor the event by providing the materials. We always try to get a Science Teacher, Career Teacher, or similar as our champion at the school. | |
| **13. Follow-Up**  (What was most important?) | Most important was to promote civil engineering as you are working with the kids. | |
| **14. Recommendations**  (What you should ALWAYS do with this project?) | After school is better than in class. Allows for more time for the activity, as well as set up and clean up. | |
| **15. Cautions**  (What you should NEVER do with this project?) | This requires lots of supervision to prevent kids from getting concrete on their clothes, floor, table, eyes, etc. Provide gloves, goggles, and dusk masks for all the kids. | |
| **16. The Outcome** | The kids get so excited and ask so many questions. | |
| **17. Ongoing Activity**  (Would you do it again?) | We try to do it every year. 2020 was on hold due to covid. | |
| **18. Speaker Contact Information**  (person from your Region who would be willing to speak about the Best Practice) | Carlos Martinez, creator of the program | |
| Name | Carlos Martinez | |
| Address |  | |
| Phone Number | 361-739-1020 | |
| Email | [carlos@pocca.com](mailto:carlos@pocca.com) | |
| **19. Additional Comments** | **Photos are attached.** | |







