ICCEPM 2022

The 9th International Conference on Construction Engineering and Project Management Jun. 20-23, 2022, Las Vegas, NV, USA

Multi-family Residential Construction Management Practice in the U.S.

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Abstract: The Multi-family Residential is one of the most famous building types for a rental property in the US. Often times it includes multiple residential buildings and some amenity facilities, including a clubhouse or leasing office, swimming pool, dog park, and garages. Since the building type is built for rental purposes, the construction planning is phased and it makes the project complicated. Detailed planning and execution are important for successful construction management. This paper provides some management practices that are applied to one of the multifamily residential construction projects in Phoenix, AZ. The Front End Planning (FEP) process performed by both owner and contractor is the first key to a successful construction project. Specifically, the early review of phased turnover strategy, grading, fire/Americans with Disabilities Act (ADA) compliance, and Mechanical/ Electricity/Plumbing/Technology (MEPT) will provide absolute benefit to the project. Second, using a scheduling method to control short-term schedules and long-term can provide the ability to manage the issues with agility. Third, material delivery and procurement dominate the both project schedule and cost. With this COVID-19 circumstance, it is hard to expect the material, equipment, and labor forces to be delivered on time with the contracted price. Managing floats are more than important to managing construction productivity. Risk management should work to share the risks fairly. Lastly, turnover is directly linked with the profit of the project for both owner and contractor. The communication between the owner and contractor to re-schedule the proper turnover schedule is important for the phased construction project.

Keywords: Multi-family Residential Construction, Front End Planning (FEP), Project Control, Procurement, Turnover