

## **Infrastructure Committee Charter (July 2020)**

**Purpose:** The infrastructure Committee was established by the combining of two previously existing committees Roads and Walk Paths and Stormwater Drainage. The basic purpose of the Infrastructure Committee is to serve in an advisory role to the Board on the continuing maintenance of the roads, walk paths and stormwater Drainage systems within the community. Even though the lakes (storage ponds) are part of the stormwater drainage system a separate Lakes Committee has been established as a sub-committee of the Infrastructure Committee and including members of the community residing around the lakes to provide emphasis on the needs and wants of the individual lakes communities.

The purpose of the Lakes committee is to handle non storm water management issues within the lakes. The Infrastructure Committee shall maintain all responsibility regarding water levels, water flow, weirs, storm pumps, and liaison to the Florida water management authorities.

### **Roads and WalkPath Sub-Committee**

#### **Statement of Purpose:**

To keep all roadways and walk-paths within Imperial Golf Estates in their proper operating condition. Undertaking the necessary steps to assure this condition can be maintained. Meeting all legal requirements of the state and county regarding the operation and conditions of our roads to provide the proper safety.

### **IGEHOA ROAD AND WALKPATH RESPONSIBILITY**

In conjunction with our Superintendent, to observe and recommend repairs to roadway and walk-path surfaces. To work with contractors to determine roadway fatigue, pavement surface coarse aggregate unraveling, structural depressions, and other evidence of possible failures. Provide inputs to annual budgets for establishing the needed reserves to maintain our roads and walk paths.

### **ROADWAY AND WALKPATH DESCRIPTION**

Imperial Golf Estates has approximately 7 miles of roads and 3 miles of walk-paths. The roads and walk-paths were installed in 5 phases. Each phase has essentially its own life cycle, although a couple of the phases have very similar life and rehabilitation time schedules. The wear and tear on our roadways are also affected by location, whether from high traffic or other conditions. In 2019 we ground and reapplied asphalt to the main roads in Phase 1-4. The roads in Phase V had a similar treatment, just an edge grind and overlay in 2010.

### **ROAD AND WALKPATH MAINTENANCE AND REHABILITATION**

To plan and prepare for the costs associated with maintaining our roadways and walk-paths. We must estimate the costs and properly reserve for them in our budgets. To work closely with the Treasurer and President to make sure the future costs are taken into consideration when yearly budgets and income requirements are put before our membership.

## **OTHER RESPONSIBILITIES**

To have the overall condition of the roadways professionally, periodically reviewed to help forecast future maintenance actions

The committee will continue to review alternate surface coating systems to help maintain the anticipated, up to 20-year life, of our refreshed roads.

### **IGEHOA's Stormwater Drainage System and Committee Responsibilities (May 2020)**

Many homeowners have questioned how our Stormwater drainage system works. It is part of a complex stormwater management system that includes Mediterra to our north, IGEHOA, the Imperial Golf Club drainage system, and communities to our south such as Willoughby, Palm River, and Colliers Reserve. The entire system is regulated and managed by the South Florida Water Management District (District) as a single, integrated system. The District establishes limits to control how much stormwater is retained and how much is released south between these communities to the canal along Immokalee Road and on out to the Gulf. Water is stored in ponds or lakes within these communities to allow for percolation into the aquifer, storage for the dry season, and to control the north to south flow of stormwater to minimize flooding during extended rain events. Many of the drainage canals south of us are county controlled, maintained and managed.

If you read articles in the Naples Daily News recently (May 2020) we entered the 2020 rainy season with significant area rainfall shortfalls. We entered June with our Imperial ponds and lakes at perhaps their lowest level in several years. Hopefully the late May and early June 2020 rainfall will quickly fill up the lakes to the max height dictated by the District at 8.5-foot elevation. Our outflow south from IGEHOA is through two movable weirs, one near Majestic Court outflowing to Horse Creek through Colliers Reserve and one at Bismarck Lake between Phases 4 and 5 outflowing to a canal that flows south to the Immokalee Road canal and another west into Horse Creek. These two IGEHOA operated weirs can be lowered, within the District specified levels to increase the water flow south out of our Imperial Stormwater storage system. However, most of the stormwater from Phases 1 through 4 flows through the drainage system of the Imperial Golf Club's east course before it reaches our outflow weir at Majestic. Stormwater from Empress and Countess Lakes take different routes through the Golf Course drainage system to the Majestic weir. With early June rains we can lower the Majestic and Bismarck weirs by approximately 12" to allow run out for lake storage of future stormwater events.

The outflow from Phase 5 is through a fixed weir at the southwest corner of Phase 5 into a canal that flows south to the canal at Immokalee Road. That weir currently has a fixed 18.5 inch outflow as dictated by the District. Prior to 2019 the fixed weir opening was 9 inches and during Hurricane Irma the was flooding of the streets for Phase 5 for many days as the system slowly drained the system. The Association has a pump that, when authorized by both the District and Collier County Stormwater Management, can be deployed to supplement the flow of stormwater around and through the Phase 5 weir.

All of the streets in Imperial were to have been built with a crown height approximately 2.5 feet below the minimum 12' elevation of the houses thereby allowing for the temporary storage of stormwater exceeding the storage and outflow capacity of our ponds and lakes on the road right of ways during significant or unexpected storms, such as 25, 50 or 100 year storms. This does not happen frequently, but long-term owners can recall early 2000 to 2003 storms when some of our streets were flooded for several days until the drainage system recovered. Similar events occurred prior to Hurricane Irma filling the entire regional stormwater system before Irma gave us a direct hit.

Downstream the major weir on Immokalee Road controls the flow of water into the gulf. It is difficult to reduce our water levels if the downstream outlet weir is not lowered by the District. Water just backs up into the system.

The bottom line is that our ability to mitigate stormwater issues is limited by very tight controls from the District; other entities and events beyond our control and borders; and Mother Nature. The Board takes Stormwater Management seriously and tries to anticipate events that allow time for us to lower our lakes for off street storage of stormwater back up but we cannot control what happens neither above us (Mediterra) nor below us (Imperial Golf Club, Willoughby, and Palm River) as we pass stormwater through this integrated system. Our Superintendent, working with the Infrastructure Committee, recommends changes to the levels of our and the Golf Club storage ponds based on anticipated storms.

The Stormwater sub-committee of the Infrastructure Committee will continue to monitor weather forecasts and recommend lowering our storage system (Empress, Countess, and Bismarck Lakes) in anticipation of forecasted future storm events. Zack's Lake levels and storage capacity in Phase 5 will continue to be controlled by the new 18.5" fixed weir outflow unless we are authorized during emergencies to use our Association owned pump to supplement the outflow from Phase 5. The members of the Stormwater sub-committee include the Co-Chairs of the Infrastructure Committee and our Superintendent. The Infrastructure Committee recommends and coordinates their stormwater management actions with the Board of Directors.