# FINAL PAPER TO THE UNIVERSITY OF HAWAI'I AT HILO MARINE OPTION PROGRAM

Audio-visual promotional video of the University of Hawai'i at Hilo's Marine Science Department and Marine Option Program's Quantitative Underwater Ecological Surveying Techniques field school.

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ABSTRACT: If students choose to go college, there are various factors that affect students' decision on where to attend. Prospective students' considerations in college selection include the tuition cost, overall surroundings of the university, student opportunities and availability of special academic programs. Universities use techniques like websites, campus tours, informational packets and social media to recruit potential students. In recent years, the most integral and influential parts of university's marketing strategies and recruitment techniques has been through the use of social media. Since not all prospective students can visit the University of Hawai'i at Hilo (UHH) due to its isolated nature, implementation of a promotional video is one of the ways students could be recruited. The development of a short video that highlights the UHH's Marine Science Department (MARE) and Marine Option Program (MOP) was created. Video clips were collected from February 2018 to March 2019 and were uploaded and edited in Adobe Premiere Elements 14 to create the final video. The final video was posted on the MARE and MOP's webpages, Facebook, Instagram, and YouTube for public access on April 10, 2019. This video allows for recruitment of prospective students and serves as a way to virtually explore the opportunities that the Marine Science Department and Marine Option Program offers their students and can serve as a stepping stone for future MOP students that are interested in continuing the production of UHH Marine Science videos.

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#### INTRODUCTION

After high school, students often continue their education by seeking higher education institutions to increase their skill set, qualify for higher paying careers, and to network socially and professionally. According to Pascarella & Terenzini (1991), college has positively affected students in many ways including gained maturity, more focus on their careers, higher overall feeling of workplace readiness, and job satisfaction. Not only does going to college increase a person's skill set and knowledge on a topic, but it has been determined that earning a degree is a worthwhile investment (Daly and Bengali 2014). On average, the pay for an individual with a bachelor's degree is approximately 40% higher, and the average college graduate will earn over \$800,000 more than the average high school graduate by retirement age (Pascarella & Terenzini 1991; Daly and Bengali 2014)

If students choose to go college, there are various factors that affect students' decision on where to attend. Studies have shown that prospective students' considerations in college selection include the tuition cost, overall surroundings of the university, opportunities and if there are other special academic programs available (Delaney 1997; UH Hilo Institutional Research Office 2011; UH Hilo Institutional Research Office 2012; Dynarski 2003, Thomason 2015). Baird (1967) also found that college selection is also dependent on a student's family income standing. For the higher income homes, selection was based mostly on social student opportunities while lower income families preferred a college that emphasized how it will prepare students for a future career (Baird 1967). When entering undergraduates were surveyed coming to UH Hilo, other people who were said to have the most influence on their college decision was their parents, friends, and high school counselors/teachers (UH Hilo Institutional Research Office 2011; UH Hilo Institutional Research Office 2012)

Though there are benefits to people continue their education, between 2010 and 2016 national undergraduate enrollment decreased by 7 percent (National Center of Education 2018) and things such as costs and selectivity for qualities and/or programs have been reasons for the lower rates (Delaney 1997; Baird 1967). According to The College Board (2018), the national average tuition for full-time in-state students at public four-year colleges and universities during the 2018-19 school year is about \$10,230 per semester, which is about 2.5% higher than tuition in 2017-18 school year. This is causing a decrease in state and local funding per public college student (The College Board 2017). Since colleges need to recruit students to keep enrollments up, and to make choosing a college and a program easier, information can be made more available through different recruitment strategies.

To recruit students, universities use techniques like websites, campus tours, informational packets and social media. Physical pamphlets and handouts serve as a vital source of information about colleges, but one of the most swaying recruitment techniques is the use of social media. In recent years, colleges have started to use Facebook to recruit students and is now considered an important admissions tool for colleges around the world (Hoover 2015). Though some studies suggest that the most effective and efficient recruitment of students is through word-of-mouth

promotion from current students (Elliott and Healy 2001), some argue that the internet has the ability of making marketing strategies feel more like a subtle and persuasive one-on-one dialogue (Kittle and Ciba 2001). In fact, 63% of colleges describe social media as an integral part of their marketing strategy (Johnson 2011), and high school graduates are using social media to learn about colleges. In 2014, 67% of teenagers said that digital social media through photos and video information was used and highly considered when researching and choosing a college (Hoover 2015). Social media and other visuals have helped applicants in the college decision process, but prospective students also want to engage with other students and people who are not paid to recruit them (Hoover 2015). Since the use of social media is proving to be an effective way to engage potential students, and video has worked in the past for other universities, UH Hilo recruitment could potentially benefit by employing these recruitment techniques.

In the University of Hawai'i at Hilo's 2017 Assessment of the Enrollment Management Report, Marcia Sakai detailed total enrollment numbers and retention rates and since the 2015-2016, the enrollment rates have decreased from -2.4% to -3.5% with a retention rate of 68.3%. Recruitment techniques at the University of Hawai'i at Hilo currently include their website; social media outreach through photos from events and school related activities; brochures/informational packets for incoming students; and campus tours (Sakai 2017). In the One of the action strategies that is being implemented for enrollment growth is expanding and enhancing digital outreach via email, web and social media. There has been an increasing use of some outreach techniques such as photos on websites (Kittle and Ciba 2001), but there is also potential to increase the use of outreach techniques like video to promote and recruit students to the University of Hawai'i at Hilo. Videos allow for fast, easy and shareable information through social network platforms and when videos are embedded, web traffic to the specific brand, program, or website increases (Costa-Sanchez 2017). Similar to how promotional videos have had the ability to positively change the image of a travel destination (Shani et al 2009), it can also do the same with college recruitment and program selection (Scott 2015).

The University of Hawaii at Hilo has a variety of departments that attract students to the school. The College of Natural Sciences has majors that tend to have higher levels of student enrolment at the university (UH Hilo Institutional Research Office 2010). One of the departments with moderate student enrolments is the Marine Science Department (MARE). Within the Marine Science Department, there is a certificate program called the Marine Option Program (MOP). The main mission in marine science program is to provide students with a personal, field-based and hands-on learning (Marine Science Department 2016). Going along with the Marine Science Department's mission, the Marine Option Program is designed to facilitate in the learning the oceans, network with professionals in the field, and expose students to future opportunities through field trips, talks, and research projects. One of the courses that highlights the MARE and MOP mission, is a two-week field course called Qualitative Underwater Ecological Surveying Techniques (QUEST). This course focuses on ecological monitoring of coral reef ecosystems using SCUBA and learning the survey techniques used by

agencies like the National Oceanic and Atmospheric Administration, The Nature Conservancy (TNC), and the Department of Aquatic Resources (DAR) (UH Hilo Marine Option Program 2018).

Entering undergraduates to UH Hilo admit that one of the highest influential factors of choosing to attend UH Hilo is the campus size and atmosphere (UH Hilo Institutional Research Office 2011; UH Hilo Institutional Research Office 2012). Since not all prospective students have the opportunity to visit UH Hilo due to its isolated nature and the University is shifting recruitment efforts by strengthening social media outreach (Sakai 2017), the development of a short video highlighting the University of Hawai'i at Hilo's (UHH) Marine Science Department and Marine Option Program was created. This allows for people around the world to learn about the opportunities, experiences, and environment that UHH's Marine Science Department and MOP has to offer their students. The videos are comprised of footage from MOP field trips, field and in class labs, and underwater video from QUEST. The final video was posted on the UH Hilo MARE and MOP's websites as well as various social media. The goal of this project was to help prospective and future students to explore the opportunities that the Marine Science Department and Marine Option Program offers their students.

### MATERIALS AND METHODS

### **Collection of footage**

From February 2018 to March 2019, video clips were collected at UHH's Marine Science Department, MOP field trips, and the QUEST field school with a GoPro HERO Session and a Canon G7X. Over the course of the semester, MOP offered students a variety of field trips and activities and video was taken at each event. Events attended included: a trip to the newest black sand beach in the world, Pohoiki, sea turtle tagging, a backpacking trip to Halape, and the SeaSTARS calibration snorkel. Video was also collected in MARE field and in class labs to emphasize the hands-on experience upon which UH Hilo's Marine Science Program is based. Videos from classes or QUEST (MARE 264/364) were also collected from alumni, current students, or staff members for which each of these individuals were credited in the final version of the video.

All video content was uploaded and sorted within approximately two weeks of collection. Potential clips that were to be used in the final video were saved for later use. Video clips were shortened to approximately 10 to 60 seconds in length using Adobe Premier Elements 14 for later use. Also, during this time, royalty-free music tracks were selected and edited to use as background music in the final video. The music for this project was found on YouTube's library of royalty-free music. Music searches were filtered with a maximum length of 3-minutes and keywords/genres like dance and electronic, inspirational, happy, pop, cinematic, instrumental, and bright. The music track called "Magic Marker" by Silent Partner was selected for the final video.

Using Adobe Premier Elements 14, the music was added to the timeline and clips were added according to shifts/changes in sounds/tones of the music. If clips were too long, they were shortened as needed. Clips were grouped based on the outline of the video: overview, marine science field classes and labs, research projects, MOP field trips and groups, sea turtle response and research, QUEST, and conclusion. To transition between topics/highlights, animated titles were placed in the lower left corner of the screen, over-top the video. If any permit numbers were required to be displayed, they were also added here. UH MARE and MOP logos were added at the beginning of the video and additional text was added at the end to let the audience know where they could find more information and to credit and to acknowledge the contributors. When the final video was complete, the project was presented at the MOP Symposium at UH Maui College on April 3<sup>rd</sup>, 2019 and later posted to the Marine Science Department and Marine Option Program's webpages, Facebook, Instagram, and YouTube for access for prospective students, current students and staff, parents, and alumni.

### **RESULTS/DISCUSSION**

Some of the events highlighted in the UHH Marine Science video are the field classes and laboratories that MARE offers, research projects that MARE and MOP students were working on, MOP field trips from Spring 2018 to Spring 2019, Sea Turtle Response and research, and MOP's QUEST field school. These events were chosen to represent the wide array of activities, programs, groups and surroundings that students could be involved with if they are in Marine Science at UH Hilo. Labs included in the video were Natural History of Sharks, Skates and Rays (MARE 380), Pelagic and Coastal Methods (MARE 350/353), Biology of Marine Invertebrates (MARE 371), Introduction to Oceanography (MARE 201), and Introduction to Coral Reefs (MARE 140). Video of research projects that students were working on for their senior capstone or mop projects were Jon Ehrenberg's thesis on the Effect(s) of sex ratios on captive social behavior and mating systems of Potter's Angelfish, Centropyge potteri, Michaela Setzer's thesis on Hehihei hehihei management for microbically mediated sediment removal in fishponds, Mia Lamirand's thesis on Investigating the relationship between the spatial feeding patterns of ornate butterflyfish and live coral coverage, and Bryant Grady's MOP project, The impacts of habitat complexity on reef fish ecology. Each of these classes and projects show the audience what kinds of activities to expect if they take these classes and emphasizes that unlike

other schools/universities, UHH Marine Science gets students into the field all four years as well as provides them the resources to do their own research.

Some of the MOP trips that were included in the video were the trips to Pohoiki, Halape, a tour on the RV Revelle from SCRIPPS, and Sea Turtle Tagging at Punalu'u Beach. Each trip had a marine related purpose as well as serving as an opportunity for students to network, socialize, and have fun. Students and staff visited Pohoiki Beach Park on after the 2018 Fissure 8 lava eruption. This is one of the newest black sand beaches in the world and serves as a good location for student to learn about beach formation and morphologies. The MOP trip to Halape was a weekend long backpacking trip that took place April 12-14, 2018 at Hawaii Volcanoes National Park. This location was hit by a large tsunami in 1975 and part of the agenda for this trip was to look for signs of where the tsunami wave hit and remnants from the event. On October 23, 2018, a research vessel from University of California San Diego, Scripps Institution of Oceanography was docked in Hilo Bay for a fuel stop and invited MOP students and Marine Science classes to take a tour of their research vessel. This trip gave students the opportunity to meet the scientists aboard, get a tour of the vessel, learn about the equipment they use and what research they are doing. Lastly, each year UHH MOP's Sea Turtle Response and Stranding Team, MOP students, and staff go to Punalu'u Beach to tag green sea turtles. This annual trip is in cooperation with George Balazs and the National Marine Fisheries Service and has been taking place for 36 years. This is a unique opportunity for students to gain experience with wild animal handling, sea turtle research techniques and endangered species work. UH Hilo MOP offers their students a variety of these experiences each semester and the video only highlighted a handful. Including the following MOP trips was to convey how MOP strives to give students plenty of networking opportunities through recreational activities, field trips, and various other marine-related subject material.

MOP's Quantitative Underwater Ecological Surveying Techniques (QUEST) field school was also featured in the final video. QUEST is a two week long, field-based course that focuses on ecological monitoring of coral reefs utilizing SCUBA. Students learn commonly utilized nearshore underwater ecological surveying techniques that many local and government agencies use to monitor coral reef ecosystems. This program is also a great way for students to network with professional scientists and learn about other opportunities to get involved in marine science. The dive group Sea Surveying Training and Response Squad's (SeaSTARS) training and dive days were also featured in the video. SeaSTARS is a program for QUEST graduates that allows for students to keep doing fish and coral surveys, as well as learn new survey methods that NOAA uses on their research cruises to the Northwestern Hawaiian Islands. Divers can increase their proficiency, depth authorization and help collect data to establish a regular time series for the east side of Hawaii Island. This video features these programs in order to give prospective or current students a visual representation of these opportunities and learn more about them on the websites if they are interested.

The events included in the video highlight how the UHH's Marine Science Department and Marine Option Program fulfill their mission statements by putting field-based curriculums at the forefront of their education approaches. This video will serve as a resource for prospective

students and will help them learn more about the academic environment & community in UHH Marine Science and could potentially help students in the college selection process. In the future, this modern recruitment technique could be continued for specific programs or classes and each could have their own video. This project can serve as a model for future videos and can be a stepping stone for future MOP projects.

#### LITERATURE CITED

- Baird, L (1967). Family income and the characteristics of college bound students. Iowa City, Iowa: American College Testing Program, pg 1-25
- Costa-Sanchez C (2017) Online video marketing strategies. Typology by business sector. Inf Commun Soc 30:17-38
- Elliott KM and Healy MA (2001) Key factors influencing student satisfaction related to recruitment and retention. J Mark High Educ 10: 1-11
- Daly MC & Bengali L (2014). Is it still worth going to college? FRBSF Economic Letter 13
- Delaney AM (1997) Parental income and students' college choice process: research findings to guide recruitment strategies. In: Accountability and Institutional Research: Measuring Results. Proceedings of the Annual Conference of the North East Association for Institutional Research. North East Association for Institutional Research, pg 77-87
- Dynarski SM (2003). Does aid matter? Measuring the effect of student aid on college attendance and completion. Amer Econ Review 93: 279-288
- Hoover, E (2009) 8 Strategies for Recruiting Adult Students to 4-Year Colleges. Chron High Educ https://www.chronicle.com/article/8-Strategies-for-Recruiting/48624 (accessed 02 Oct 2018)
- Hoover, E (2015) Teenagers and Colleges Are of 2 Minds on the Best Recruitment Strategies. Chron High Educ https://www.chronicle.com/article/TeenagersColleges-Are-of/231703 (accessed 02 Oct 2018)
- Johnson, L (2011). More Colleges Use Facebook to Recruit Students. Chron High Educ https://www.chronicle.com/blogs/headcount/more-colleges-use-facebook-to-recruit-students/29366 (accessed 02 Oct 2018)
- Kittle B and Ciba D (2001) Using College Web Sites for Student Recruitment: A Relationship Marketing Study. J Mark High Educ 11: 17-37
- Marine Science Department (2016) University of Hawaii at Hilo Marine Science Department www.mare.hawaii.edu (accessed 02 Oct 2018)
- Pascarella ET & Terenzini PT (1991). How college affects students (Vol. 1991). San Francisco: Jossey-Bass.
- Sakai M (2017) University of Hawaii at Hilo Enrollment Management Report https://hilo.hawaii.edu/chancellor/EnrollmentManagementReport.php (accessed 02 Oct 2018)

- Shani A, Chen P, Wang Y, Hua N (2009). Testing the Impact of a Promotional Video on Destination Image Change: Application of China as a Tourism Destination. Int J Tourism Res 12: 116 133
- Scott DM (2015). The new rules of marketing and PR: How to use social media, online video, mobile applications, blogs, news releases, and viral marketing to reach buyers directly. John Wiley & Sons. Hoboken, NJ
- The College Board (2018) Average published undergraduate charges by sector and by Carnegie classification, 2018-19 https://trends.collegeboard.org/college-pricing/figures-tables/average-published-undergraduate-charges-sector-2018-19 (accessed 29 Oct 2018)
- The College Board (2017) Total and Per-Student State and Local Funding and Public Enrolment over Time https://trends.collegeboard.org/college-pricing/figures-tables/total-and-student-state-and-local-funding-and-public-enrollment-over-time (accessed 29 Oct 2018)
- The Condition of Education (2018) National Center of Education Statistics: Undergraduate Enrollment https://nces.ed.gov/programs/coe/indicator\_cha.asp (accessed 02 Oct 2018)
- Thomason, A (2015). Even Private Colleges Feel the Pain as Enrollment Falls Again. Chron High Educ https://www.chronicle.com/blogs/ticker/even-private-colleges-feel-the-pain-as-enrollment-drops-again/98839 (accessed 02 Oct 2018)
- UH Hilo Institutional Research Office (2011) Entering Undergraduate Survey, AcYr 10/11-- Fall 2010 + Spring 2011 https://hilo.hawaii.edu/uhh/iro/student\_entering.php (accessed 02 Oct 2018)
- UH Hilo Institutional Research Office (2012) Entering Undergraduate Survey, AcYr 11/12-- Fall 2011 + Spring 2012 https://hilo.hawaii.edu/uhh/iro/student\_entering.php (accessed 02 Oct 2018)
- UH Hilo Institutional Research Office (2010) Majors and Degrees Awarded: Fall 2003-Fall 2010 Detail Student Headcount by Major & Degree https://hilo.hawaii.edu/uhh/iro/student\_certsdegrees.php (accessed 02 Oct 2018)
- UH Hilo Marine Option Program (2018) University of Hawaii at Hilo Marine Option Program uhhmop.hawaii.edu (accessed 02 Oct 2018)