

**PORT OF BROOKINGS HARBOR**  
**Special Commission Meeting**  
**Tuesday, August 30, 2022 • 10:00am**  
**Teleconference / Meeting Room** *(limited capacity)*  
**16350 Lower Harbor Road Suite 202, Harbor OR, 97415**

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**Teleconference Call-In Number: 1 (253) 215-8782**

**Meeting ID: 771 205 4017**

**Passcode: 76242022**

**(to mute/unmute: \* 6)**

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**TENTATIVE AGENDA**

**1. CALL MEETING TO ORDER**

**PAGE**

- Roll Call
- Modifications, Additions, and Changes to the Agenda
- Declaration of Potential Conflicts of Interest

**2. APPROVAL OF AGENDA**

**3. PUBLIC COMMENTS** – Limited to a maximum of three minutes per person. Please email your comments to [danielle@portofbrookingsharbor.com](mailto:danielle@portofbrookingsharbor.com) prior to the meeting if you are calling in.

**4. ACTION ITEMS**

A. None

**5. INFORMATION ITEMS**

A. Boat Yard Building(s)

**6. COMMISSIONER COMMENTS**

**7. REGULAR MEETING DATE** – Wednesday, September 21, 2022 at 2:00pm

**8. ADJOURNMENT**

A request for an interpreter for the hearing impaired, for those who want to participate but do not have access to a telephone, or for other accommodations for persons with disabilities should be made at least 48 hours in advance of the meeting to Port of Brookings Harbor Office at 541-469-2218.

*This Institution is an Equal Opportunity Provider*

# INFORMATION ITEM – A

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**DATE:** August 30, 2022  
**RE:** Boat Yard Building(s)  
**TO:** Honorable Board President and Harbor District Board Members  
**ISSUED BY:** Travis Webster, Harbormaster

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## OVERVIEW

- Boat Yard Warehouse condition was brought to the Boards attention February 24, 2022.
- August 17, 2022, Regular Meeting the Board approved to not have a structural analysis done on the building and begin the process to start choosing the design at a future meeting.
- Jack Akin suggested to explore grants to fund the new building.

## DOCUMENTS

- 2022 Commissioner Meeting Review, 4 pages
- February 24, 2022, Workshop Commissioner Meeting Minutes, 1 page
- February 24, 2022, Workshop Commissioner Meeting Packet, Information Item E, 7 pages
- April 4, 2022, Special Commissioner Meeting Minutes, 1 page
- April 4, 2022, Special Commissioner Meeting Packet, Information Item D, 9 pages
- May 18, 2022, Regular Commissioner Meeting Minutes, 1 page
- May 18, 2022, Regular Commissioner Meeting Packet, Action Item B, 15 pages
- June 15, 2022, Regular Commissioner Meeting Minutes, 1 page
- June 15, 2022, Regular Commissioner Meeting Packet, Information Item F, 20 pages
- July 20, 2022, Regular Commissioner Meeting Minutes, 1 page
- July 20, 2022, Regular Commissioner Meeting Packet, Action Item A, 5 pages
- August 17, 2022, Regular Commissioner Meeting Packet, Action Item C, 11 pages

## 2022 Commissioner Meeting Review

#	Meeting Date	Action Item	Information Item	Commission Vote Approve / Fail / Hold	Notes
1	Tuesday, January 11, 2022		Non-Moorage Charter Fees		
2			Port Best Management Practices Amendment		
3			Oregon State Marine Board Maintenance Assistance Grant (MAG) Grant Application		
4			ODEQ Tier 2 Corrective Actions and Notification to Gear Storage Users		
5			Pelican Bay Arts Association Request for 5-year Agreement		
6			POBH Employee Handbook 2022		
7			Business Oregon FEMA Matching for DR-4432 and DR-4452		
8			Sale of Business – Bounder Fresh Crab Consent to Assignment and Assumption of Lease		
9			North Jetty Access		
10			Stormwater Test Results for December 13, 2021		
11			Boardwalk Condition and Modifications		
12			Fuel Dock – Fuel Tank Control Box Repair and Protective Structure		
13			South Coast Credit Accounts		
14			Vessel Miss Stacey		
15			Financial Consultant Contract		
16			Curry County Sheriff Substation Office MOU		
17			Zola's on the Water Late-Night Activities		
18			SDAO Annual Conference 2022		
19			Blue Fin Realty Lease Renewal Amendment No. 1		
20			Hallmark Receiving Dock Condition		
21			4th of the July Fireworks		
22			Basin 1 Storm Damage to Vessels		
23			Mountain View Custom Cycles LLC and Rebel Ink Tattoo Studio LLC and Barber Shop Lease		
24			Tidewinds Sportfishing Request for Signage Space		
25			2022 SDIS Property / Casualty Insurance Renewal and Longevity Credit and Rate Lock Guarantee		
26	Wednesday, January 19, 2022	Best Management Practices Amendment		Approved	
27		Oregon State Marine Board Maintenance Assistance Grant (MAG) Grant Ap		Approved	
28		Notification to Gear Storage Users		Approved	
29		Pelican Bay Arts Association Request for 5-year Agreement		Approved	
30		POBH Employee Handbook 2022		Hold	Under Port Legal Counsel Review
31		Sale of Business Bounder Crab Shack Consent to Assign. and Assum. of Lease		Approved	
32		North Jetty Access and Crab Dock Removal		Approved	Close Jetty Access and remove dock when project warrants
33		Boardwalk Condition and Modification		Approved	Separate damage section and extend handrailing
34		CBN Enterprises		Approved	Allow Southern Oregon Credit Services / Collect Northwest to proceed with litigation
35		Financial Consultant Contract		Approved	
36		Blue Fin Realty Lease Renewal Amendment No. 1		Approved	
37		Vessel Miss Stacey Update		Approved	Placing Lien on vessel, crab pots, gear and crab pot permit
38			Budget Calendar for Fiscal Year 2022-23		
39			Tsunami January 15, 2022, Update		

## 2022 Commissioner Meeting Review

#	Meeting Date	Action Item	Information Item	Commission Vote Approve / Fail / Hold	Notes
40	Friday, January 28, 2022	DEQ Tier 2 Corrective Action Report		Approved	
41			Moorage License Agreement – Recommended Revisions		
42	Wednesday, February 16, 2022	Non-Moorage Charter Fees		Approved	
43		Budget Officer Appointment		Approved	Approved Kim Boom
44			Next Workshop Meeting Date		
45	Thursday, February 24, 2022		Vessel Miss Stacey		
46			Derelict Vessels		
47			Moorage License Agreement Revisions		
48			Port Rates July 1, 2022, to June 30, 2023		
49			Boat Yard Warehouse Condition		
50			Budget Committee Applications – Selection Process		
51			Fuel Tank Control Box Protective Structure		
52			2022 Events at the Port		
53			RV Park Project Delay		
54			Delinquent Account Write Off Request		
55			Congressman DeFazio Earmark for WWTP Update		
56	Wednesday, March 16, 2022	Moorage License Agreement Revisions		Hold	Reviewing live-aboard and marine survey
57		Budget Committee Selection		Approved	Filled 3 vacancies
58		Delinquent Account Write Off Request		Approved	
59		Boat & Trailer Storage Area(s)		Approved	
60		Port Rates July 31, 2022 to June 30, 2023		Approved	
61		Commercial Fillet Station		Approved	
62		Port Manager Employment Agreement Amendment No. 2		Approved	
63			FEMA Project Update		
64			2022 Salmon Season Update		
65			Vessel Miss Stacey Update		
66			Stormwater Test Results		
67			Wastewater Treatment Plant		
68	Thursday, March 24, 2022	Special District Insurance Services Employee Health	Care Plan Renewal	Approved	
69		Budget Committee Members		Approved	Filled 1 vacancy
70		FEMA Project Preliminary Drawings & Update		Approved	
71	Monday, April 4, 2022	Wastewater Treatment Plant Information		Motions failed	
72			Stout Mountain Railway Proposal		
73			Tidewinds Sportfishing Signage Request		
74			POBH Employee Handbook 2022		
75			Boat Yard Warehouse Condition		
76			Hallmark Dock Condition		
77			Supplemental Budget		
78			SCKS Consent to Assignment		
79			Business Oregon FEMA Matching Project L22009 Contract		
80			Business Oregon FEMA Matching Project L22008 Contract		
81			Live-Aboard Policy Update		
82			Moorage License Agreement Revisions		
83			Non-Moorage Charter Boat Launch Fee		



## 2022 Commissioner Meeting Review

#	Meeting Date	Action Item	Information Item	Commission Vote Approve / Fail / Hold	Notes
84			Curry County Tourism and Promotions Committee		
85			MOU - Port and Curry County Sheriff Department		
86	Wednesday, April 20, 2022	Stout Mountain Railway Proposal		Fail	Possible at other Port areas
87		Tidewind Sportfishing Signage Request		Approved	Angle existing sign and add sign
88		POBH Employee Handbook 2022		Approved	
89		First Supplemental Budget FY 2021-22		Approved	
90		SCKS Consent to Assignment		Approved	
91		Business Oregon FEMA Matching Project L22009 Contract		Approved	
92		Business Oregon FEMA Matching Project L22008 Contract		Approved	
93		Moorage License Agreement Revisions		Approved	
94		Non-Moorage Charter and Guide Boat Launch Fee		Approved	Launch fee not included
95		MOU Curry County Sheriff Substation		Approved	
96		Live-Aboard Policy Revisions		Approved	
97		C.J. Huntsman Engagement Letter		Approved	
98		Wastewater Treatment Plant Timeline		Approved	EMC Engineering to start on design
99		RV Park Septic Tank on Drawing Clarification		Approved	Connect sewer to Harbor Sanitary
100		Commissioner and Staff Relations		Approved	
101			Charter and Guide Boat Sign Concept		
102			RV Park Change Order		
103			USACE Maintenance Dredging		
104			Fish Cleaning Building Repairs		
105	Friday, May 6, 2022	RV Park Change Order and Payment Request		Approved	C.O., time extension, payment
106		Crab Dock		Approved	Keep crab dock
107		SDAO Insurance Claim - Replacement of Broken Dock Pile		Approved	Repair pile and prepare contract
108			Commissioner and Staff Communications and Relations		
109	Tuesday, May 10, 2022	Budget Committee Meeting - FY 2022-2023 Budget Presentation		Approved	
110	Wednesday, May 18, 2022	Billeter Marine Public Improvement Contract			
111		Boat Yard Warehouse Engineering Report			
112		Richard Cortez Delinquent Account Write Off Request			
113		Charles Case Delinquent Account Write Off Request			
114		Charter and Guide Boat Sign			
115			April Stormwater Test Results and Tier 1 Report		
116	Wednesday, June 15, 2022	Budget Hearing		Approved	
117	Wednesday, June 15, 2022	Vessel and/or Trailer Storage Agreement		Approved	
118		Vessel Miss Stacey Moorage Renewal		Approved	
119		Charters and Guides Sign Agreement Form		Approved	
120			BOEM Wind Energy Farm Off the Coast of Brookings Oregon		
121			Pacific Seafood Request for Dock Hoist		
122			Zola's on the Water Concrete Patio outside Leased Premises		
123			Cable TV and Wi-Fi at Beachfront RV Park		
124			USDA Civil Rights Compliance Review & Response		
125			Boat Yard Building(s) and Port Office Proposal		
126			RV Park New Fence Dividers		
127			Summer Food Dine-In Bus Route		

## 2022 Commissioner Meeting Review

#	Meeting Date	Action Item	Information Item	Commission Vote Approve / Fail / Hold	Notes
128			Travel Lift Ramp Sediment Impacts		
129			Beach Cam for Website		
130	Tuesday, June 21, 2022	Approval of Resolution No. 2022-07 Regarding Offshore Wind		Approved	
131	Wednesday, July 20, 2022	Boat Yard Building Plan		Approved	To acquire second structural analysis of existing building and to bring it up to code
132		Zola's on the Water Lease Amendment No. 2		Approved	
133			Curry County Storm Drain Master Plan Draft April 2022 Review – Curry County Commissioners and Port Commissioners Meeting Date		
134			Dog Leash Law Enforcement		
135			Small Debris Left Behind on the Jetty from Fireworks Show		
136			Boat Ramp and Boat Parking Area		

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Port Counsel, Jess Webster, discussed derelict vessel and suggested to first speak with your insurance broker, and see if its even possible to get endorsements for specific vessels, which you can pass onto the tenants. Port Counsel than discussed the suggested changes to the moorage agreement. It's a good idea with your tenant that you impose personal liability on the principle of a cooperate entity that owns a boat. Another change is in section 9, the Port should have the discretion to ask for current condition survey. Section 11, is having a hold over tenancy fee, would increase fees for anyone who hold over and abandon their vessel. Port Counsel suggested to update our Port Ordinance. James Sabin explained that vessels over 30ft are not covered by SDAO. Currently is looking into other insurances to see if they would be willing to insure over 30ft vessels, but at what premium. Mr. Sabin has discussed with multiple Surety Bond agencies, and they state they would never bond a boat like this and never take it on. Currently being told it will not work and not feasible to do, and a lot of people will not be able to afford it

**D. Port Rates July 1, 2022, to June 30, 2023 – Audio time 28:21**

Dehlinger noted that every year around this time we review our rates, we do ask for a CPI increase, this year of 4.5%. Dehlinger explained that staff did look at other Ports and reviewed the Ports and rates that were evaluated. Discussed our maintenance costs and what the Port should be putting back into its docks/facilities. Commissioner Heap asked why commercial vessels have a substantially lower rate than recreational vessels, even though commercial vessel cause a lot more wear and tear to the docks and facility. Webster and Dehlinger tried to explain why it has been that way, to economically advertise to the commercial fleet and receive more vessels but our Port has the lowest moorage rates. Board suggested to have commercial and recreational vessels at the same rate.

**E. Boat Yard Warehouse Condition – Audio time 56:30**

Dehlinger noted that a tenant informed staff that the back door was broken. After further investigating it turned out to be multiple rotten boards. Jack Akin, Port Engineer, was asked to give Port his recommendation on fixing the structure. For the meantime staff placed temporary posts.

**F. Budget Committee Applications – Selection Process – Audio time 1:03:08**

Dehlinger noted that there are three vacancies and have received four applications. On March 9<sup>th</sup> the applications will be provided to the board to review. The board then will rank one through five, the top ranked person will receive one position, second highest will receive the second position, and the third highest will receive the third position. If the board wants to interview the applicants, Dehlinger will schedule a meeting before the regular board meeting.

**G. Fuel Tank Control Box Protective Structure – Audio time 1:04:55**

Dehlinger reviewed what was discussed in the last meeting regarding this item. Informed the board that steel building companies will not supply anything that small, also investigated metal building from Home Depot and Lowes but believes those building will not withstand the weather. Staff is now recommending concrete blocks and place a lid on top.

**H. 2022 Events at the Port – Audio time 1:07:37**

Dehlinger noted what events will be happening down at the Port for the year 2022 so far.

**I. RV Park Project Delay – Audio time 1:08:50**

Dehlinger noted the letter received from the contractor regarding to why the delays have happened. Coos Curry Electric has checked the transformers and tried to pull the wire, which they were not able to do, it is believed that the conduit may be damaged. Mike Crow, Engineer, is set up a meeting with Coos Curry Electric to discuss further action on the electrical. The board discussed their disappointment in finding this out a week before renovations were supposed to start.

**J. Delinquent Account Write Off Request – Audio time 1:15:17**

Dehlinger noted this is regarding only one account and reviewed the history of the account. The boat was not seaworthy, the owner left the vessel in our hands, the Port disposed of the vessel at CTR. These fees came from

## INFORMATION ITEM – E

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**DATE:** February 24, 2022  
**RE:** Boat Yard Warehouse Condition  
**TO:** Honorable Board President and Harbor District Board Members  
**ISSUED BY:** Gary Dehlinger, Port Manager

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### OVERVIEW

- Tenant leasing section of the boat yard warehouse notified Port staff the back door was broken. When staff arrived to see what had happen, they noticed severe rot to the timbers.
- Port staff installed temporary support beams until engineers can assess the conditions.
- Port engineer Jack Akin came out last week and we are waiting on his evaluation and recommendations.
- This building was move from another location to the Port sometime in 1975. The building is 47 years old at this location. Some of the know issues:
  - 1) Rotten / broken post and beams
  - 2) Worn metal shell / leaking roof
  - 3) Broken doors
  - 4) Outdated electrical system (only one electrical meter within the warehouse for multiple tenants)
  - 5) Outdated plumbing
  - 6) Floor floods during rainstorms
- Port has four (4) four tenants renting space within the warehouse totaling \$3,576 per month.
- Port staff is looking at repair or replacement options.

### DOCUMENTS

- Photos of rotten timbers and temporary support beams, 5 pages









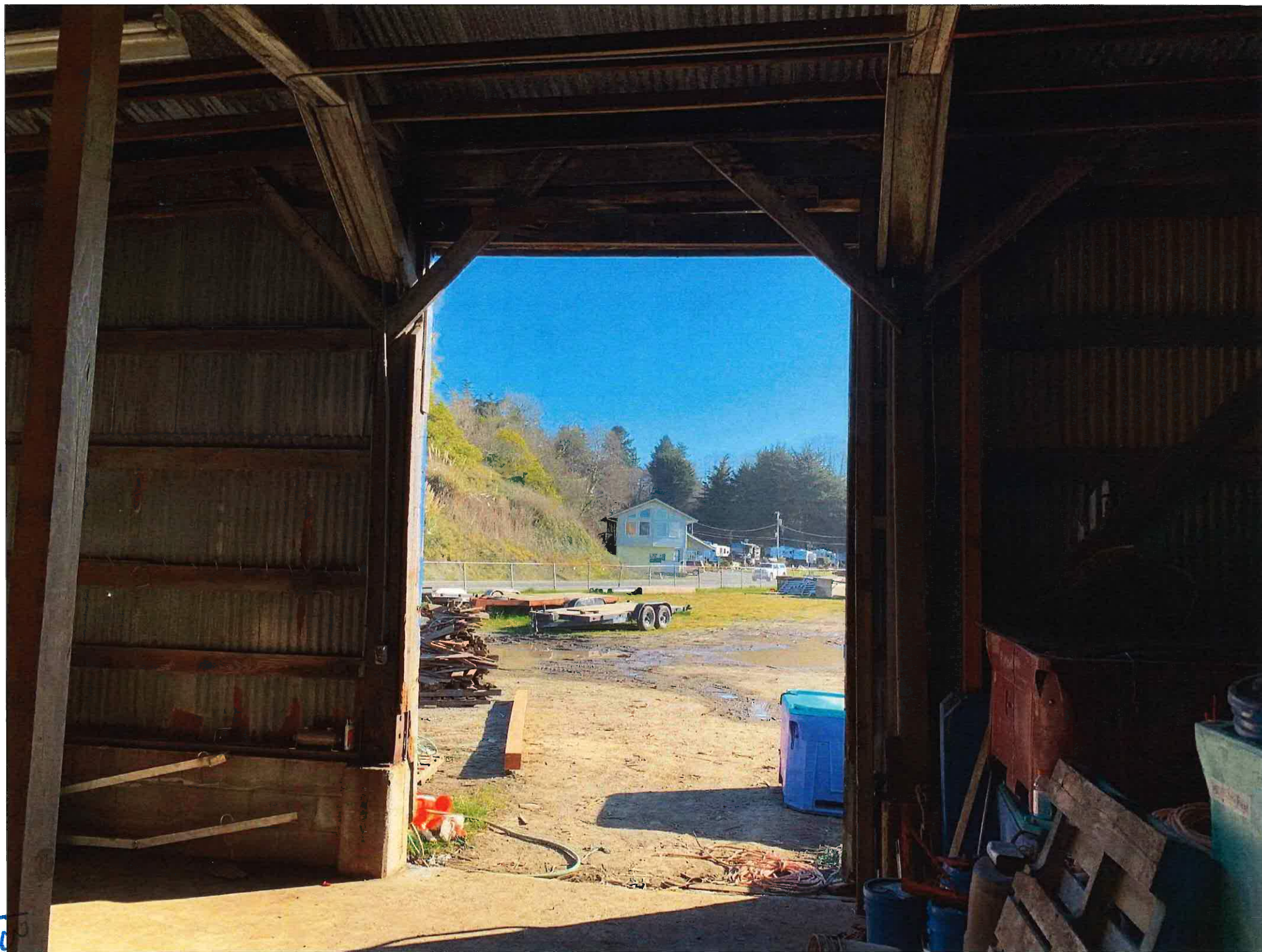


















Dal Ponte: Like I said earlier the plant was never properly permitted so we acted for two years under a temporary agreement with DEQ (inaudible) permit it in the future, that temporary agreement expired in December. Our proposal to the agency is to extend the agreement that (inaudible) any development of the treatment system that we know is necessary in order to meet the needs of the standards, DEQ is considering that proposal right now. But has yet to deliver a final answer, we hope to hear back from the agency (inaudible) we could have the certainty that we need (inaudible) to operate (inaudible) for the upcoming shrimp season.

Commissioner Heap: Okay, thank you. Alright with that I would propose a 5-minute recess we will take 5 minutes and we will come back and deal with the rest of the agenda.

**Commissioner Heap adjourned into a 5-minute recess – Audio time 1:02:17**

**Commissioner Heap reconvened the meeting – Audio time 1:09:43**

## **5. INFORMATION ITEMS**

### **A. Stout Mountain Railway Proposal – Audio time 1:09:51**

Dehlinger introduced Tony Parrish, who gave a presentation to the Board proposing placing a garden railway in the commercial retail area.

### **B. Tidewind Sportfishing Signage Request – Audio time 1:20:11**

Dehlinger noted that Kyle Aubin, owner of Tidewind Sportfishing, gave the Board another letter regarding his signs and proposed locations to lease land from the Port for the signs. Dehlinger reminded the Board that the last time this was discussed the Board wanted to look at one sign for multiple charters, which Dehlinger does have a meeting with company today regarding the sign and would be able to give the Board more information after the meeting with that outfit.

### **C. Port Employee Handbook Revisions – Audio time 1:25:03**

Dehlinger noted there were 2200 changes to the handbook and will bring this to the next meeting for approval. There was no other discussion among the Board.

### **D. Boat Yard Warehouse Condition – Audio time 1:27:48**

Dehlinger noted that Jack Akin did make a report on the building but would like to investigate the building more before making a final determination.

### **E. Hallmark Dock Condition – Audio time 1:30:31**

Dehlinger noted Jack Akin is recommending putting survey points on the dock, so we have a base line, and do a load test on the dock.

### **F. Supplemental Budget FY 2021-22 – Audio time 1:31:17**

Dehlinger noted that cash carry over was more than anticipated and we are making an adjustment on. Commissioner Heap reviewed what the supplemental budget was.

### **G. South Coast Knight Security, Consent to Assignment & Assumption of Agreement – Audio time 1:32:22**

Dehlinger informed the Board that Four Aces has purchased South Coast Knight Security and would like a name change, nothing else has changed.

### **H. Business Oregon FEMA Matching Project L2209 Contract – Audio time 1:33:09**

Commissioner Heap asked to discuss this item and Information Item I at the same time. Dehlinger noted that both these projects are for the FEMA projects. These contracts are the matching funds coming from Business Oregon to take care of our 25%.

### **I. Business Oregon FEMA Matching Project L2208 Contract**

Item was discussed in Information Item H.

## INFORMATION ITEM – D

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**DATE:** April 4, 2022  
**RE:** Boat Yard Warehouse Condition  
**TO:** Honorable Board President and Harbor District Board Members  
**ISSUED BY:** Gary Dehlinger, Port Manager

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### OVERVIEW

- Port staff discussed with the Board the current condition with our boat yard warehouse. Jack Akin / Port Engineer came on site and looked at the current condition of the building and has provided a summary of the site investigation.
- Jack stated in his report that he recommended a wood frame engineer to do further analysis. See page 3.
- The Port and Jack are working on getting additional information for the Board to review before making any decisions.

### DOCUMENTS

- EMC Engineer/Scientists Summary Report, 8 pages



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**- Engineers/Scientists, LLC**

3/10/22

Gary Dehlinger, Port Manager  
Travis Webster, Harbormaster  
Port of Brookings-Harbor  
Lower Harbor Rd.,  
Brookings OR

The following updates and recommendations are listed below. To simplify your review, a summary for the two topics (the Three Port Structures, and FEMA status), are provided. More detail and background follow.

### **Summary RE the Three Port Structures**

After our on-site inspection of the Boatyard office/shop building, the Hallmark Dock and the north boardwalk section, we concluded and recommend

1. A final inspection by a structural engineer, specifically knowledgeable in wood framed buildings, should be done, along with the Port engineer (Jack Akin), to confirm the present opinion, expressed by the Port engineer, that at least the impacted sections of the building should be demolished.
2. The Hallmark dock seems stable at this time, but broken or what appears to be dislodged friction piles should be monitored and tested. The recommended monitoring is via  $\pm 1/8$  inch precision survey, followed by a proof-roll protocol loading, specified to be 2.0 times that of the greatest anticipated load on the dock. Further monitoring via survey should be  $1/4$  ly, until data confirms that no significant failure is occurring, after which routine surveying can be conducted annually. It is noted, in the longer term, that replacement of the dock is included in the Natural Hazards Mitigation Plan.
3. On a short term basis the Port engineer concurs with the Port Manager and Harbormaster that decoupling of the sliding section of the boardwalk would be wise, as it would prevent the failing section to pull at and loosen more of the boardwalk southward. In the long-term, the consulting engineering geologist concurred with previous determinations made by the Port engineer that slip failure is the cause of the observed damage, and that therefore complete removal and embankment stabilization is needed.

*Note: A copy of an emailed letter from Eric is on Page 8.*





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**- Engineers/Scientists, LLC**

## **FEMA Update Summary**

1. The Boatyard surface and stormwater designs, after a number of revisions, are completed and construction drawings have been prepared.
2. The final phase of the preliminary drawings for the Commercial Area, also after number revisions, are to be completed by the afternoon of Friday, March 11.
3. We expect the construction drawings for the Commercial Area to be completed by Friday, March 18.
4. RV/Kite Field preliminary drawings are completed.
5. Construction drawing details for the RV/Kite Field are expected to have been completed by the week of 21<sup>st</sup> of March.
6. The detail drone survey of the west embankment of Basin 2 is completed. Final construction drawings for the Basin 2 west wall embankment repair are expected to be completed by the week of March 28.
7. Regarding dredging of the basins, the laboratory analyses have finally been received from the lab and reviewed, but some errors in the data have been found. We are in conference with the lab today and tomorrow (3/10 and 3/11), and will speak with the organics department tomorrow morning.
8. The Sediment Characterization Report has been completed and submitted to the USACE. Subsequent discussion with the USACE representative (James Holm) for the PSET has occurred yesterday and today (3/09 and 3/10), and they are also awaiting the results of our conversations with the laboratory.
9. The sediment has been found to be high in silt. We are reviewing beneficial use options, including local concrete manufacture, and will be arranging a discussion with local businesses, likely sometime in April.
10. We are arranging a conference call with Greg Jackson (State Project Manager), Julie Slevin and Douglas Grant (FEMA Project Managers), EMC and any Port Staff members that desire to participate. We are trying for the week of March 14<sup>th</sup>. We will propose to separate the in-water work from the upland work to avoid delays. We will contact you as soon as some dates for the conference, targeted for next week (week of March 14<sup>th</sup>) have been proposed.



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### *Port Structures*

On February 18, 2022 Jack Akin and Rick Gates of EMC, Gary Dillinger and Travis Webster of POBH and Eric Oberbeck, Engineering Geologist from Cascadia Geotechnical, all referred to in this Report as the Group, met at the Port of Brookings-Harbor to look at three structures. These were the shop building at the Boatyard, the Hallmark commercial receiving dock and a north-most section of the Port boardwalk.

### *Boatyard Shop*

The shop building has a number of structural and surficial issues within its wood frame structure. Load supporting columns, beams and truss members have considerable dry rot, stress cracking and loss of function. Eric did not feel qualified to comment about the building structure itself, but gave an opinion about placing some exploratory borings along the south side of the building to investigate the threat of liquefaction. Jack expressed the opinion that liquefaction is likely a long-term issue, but not germane to the immediate structural concerns in question. He also observed that the condition of some loaded columns and beams was poor, and that repair of these wood frame members on a permanent basis would not be practical, but continued repair would be a good temporary measure (maximum two years), likely to be followed by the demolition and replacement of the building.

As can be seen in the first paragraph of Eric's written recommendations, attached on Page 8 below, Eric concluded shallow borings and penetration tests be performed in the Boatyard.

Though such study may be prudent in the long term, in our opinion the recommendation is premature. If design loading, peradventure the existing structure is replaced, indicates the need, further investigation along these lines may be justified.

On the shorter term, it is still yet to be determined that the building is safe at present, and whether further shoring up can temporarily, or even more permanently provide a safe workspace. A structural engineer trained in wood frame analyses is therefore recommended by EMC. EMC is presently in contact with two local, qualified firms.

### *Hallmark Dock*

The Group then moved to the Hallmark commercial receiving dock, in order to render an opinion about the dock's condition and recommended actions to be taken. The dock is a somewhat complex structure of concrete decking supported by friction piles. There are no known drawings or construction information (length of friction piles, truss calculations, concrete deck specifications, etc.).





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When comparing its construction with marine dock guidelines it could be fairly stated that the dock seems overbuilt. It was a general consensus of the Group that some structural testing and monitoring should be performed in order to assess and measure, watching for any signs of loss of function or failure. Eric suggested tilt meter placement at several locations, with periodic tilt meter measurements to monitor for dock surface movement (see second paragraph of Eric's opinion below on Page 8 )..

Alternatively, with respect to monitoring the dock position, it is the EMC opinion that the tilt meter, accurate to about 1/60 of a degree, is not the best monitoring method to measure the absolute position of various point locations on the dock. Rather, it seems best to tie the dock into a benchmark-surveyed point, and to horizontally and vertically locate markers placed on the dock. Mounted on such a large and massive structure which is comprised of multiple members on deck and supporting piles, tilt meter measurements may reflect multiple and somewhat compensating position shifts on the dock surface. Surveyed points, however, accurate to a quarter  $\pm 1/8$  inch, would measure absolute horizontal and vertical position of the dock.

Load testing at Hallmark was also discussed. Although experimental testing to determine dock loading capacity was discussed, Jack, Travis and Gary all agreed that the capacity of the dock was not what was in question, but rather a reasonable approximate of the effect of existing loads. Capacity testing could lead to weakening or even failure, whereas load testing with reasonable loads and acceptable safety factoring could be measured with much less risk to the structure itself.

Per good engineering practice, it would therefore be EMC's recommendation that proof rolling technique be applied along Hallmark dock deck, utilizing a load safety factor of 2.0. Port staff and dock representatives should be interviewed to estimate the largest load ever expected to be applied to the dock at any given time. At least twice that load would then be applied in testing. A discrete point survey would be conducted prior to the test, and the second survey conducted no longer than a week thereafter. The monitoring procedure should then be implemented, recommended by EMC to be 1/4ly, whereby the located points at the dock would be re-surveyed in order to monitor for vertical or lateral movement. After three or four quarters of measurements, if it has been concluded that the dock is stable, monitoring routine periodicity should be revised to an annual survey.

#### North Boardwalk

Finally the group took a look at the north boardwalk section, presently failing, to discuss long and short term solutions. Eric concurred with EMC (see third paragraph of Eric's recommendations below on Page 8) that failure in this section is primarily due to a slip surface, causing lateral and rotational movement.

Consequently, the entire soil wedge supporting that section of the boardwalk is slipping, and so no superficial/re-fastening of the existing structure can be posed as a solution.





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The EMC analyses of this area provided to the Port in March of 2017, Page 2, begins with "It appears that the soils comprising the sideslope north of the boardwalk have become unstable and have consequently pressed the retaining wall against the outer deck-supporting piles, pulling the boardwalk westward with its deflection. Based on these observations, stormwater has 1) reduced soil cohesion, eroded soils and destabilized the soil mass; and 2) created one or more slip surfaces that allows its soil friction to be overcome by the slope and the mass to shift westward." The factors are then enlisted as (a) sliding of the wall outwards from the retaining soil, (b) overturning of the retaining wall about its toe, (c) foundation bearing failure, and (d) larger scale slope or other failure in the surrounding soil.

Therefore the entire structure section should be removed, and the embankment stabilized. Whether to replace the existing structure or not is a decision that Port management would have to make.

If replacement is opted, then reconstruction can include bracing and fastening (via pins, screws, deadman, depending on soil friction values determined by subsurface investigation).

On the shorter term, as recommended in the 2017 study, continued monitoring should be conducted.

Also, Gary and Travis suggested, as a temporary solution, that the failing section of the boardwalk be decoupled from the south-adjacent portion of the boardwalk, still in-tact, in order to prevent further southward damage. EMC concurs with this precautionary action.

#### *FEMA Update*

A report on the status of the FEMA projects must include those of the Boatyard, Commercial Area, RV/Kite Field, Embankment Reinforcement along the West Side of Basin 2 and the Dredging of the Basins.

Discussion about the Boatyard includes the subbase/subgrade excavation and preparation, stormwater catch basin and piping detail, and paving detail.

Discussion about the Commercial Area includes the same, with the additions of retaining wall and sediment storage detail.

The RV/kite field area, including grading, stormwater and paving design, which fall under the FEMA funding program, as well as utility (power, water and sewage), which are non-FEMA, are the topics of discussion.

The Boatyard surface and stormwater designs, after a number of revisions, are completed and construction drawings have been prepared.



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An objective of minimizing costs by eliminating as much excavation and subgrade materials as possible has been achieved, as now the bill of materials only calls for about 15 yd.<sup>3</sup> of spoils production during the excavation phase of the yard surfacing. Once the final subbase/subgrade elevations were determined, pipe invert and ditch elevations, slopes, catchment areas, pipe sizes, ditch dimensions designs followed. Final top-of-pavement surface elevations were required to meet with existing structures (concrete pad, building foundations).

The final phase of the preliminary drawings for the Commercial Area, also after number revisions, are in process and expected to be completed by the afternoon of Friday, March 11. At that time these preliminary drawings will be forwarded to our CAD construction detail specialist, and we expect those construction drawings, which include final subbase/subgrade elevations, pipe invert and ditch elevations, slopes, catchment areas, pipe sizes, ditch dimensions designs, sediment storage slopes and retaining wall design, elevations and dimensions. Final top-of-pavement surface elevations are required to meet with existing structures (concrete pads and loading dock, building foundations) to be completed by Friday, March 18.

RV/Kite field preliminary drawings are completed, and construction drawing details are relatively easy for that portion of the project, and so will be expected to have been completed the following week (the week of 21<sup>st</sup> of March).

The detail drone survey of the west embankment of Basin 2 is complete and the data has been converted into CAD data, presently under review. The building of a new, trimmer bill of materials for the excavation, cut/fill and rock construction is underway, expected to be completed by the end of next week (the week of March 13). Final design drawings for the Basin 2 west wall embankment repair are expected to be completed by the week of March 28.

Regarding dredging of the basins, the laboratory analyses have finally been completed, and yet some errors in the data have been found.

We have reviewed the lab reports, and after inspecting the quality control/assurance reports, suspect errors in the detection levels, and subsequently we are seeking a revision in reported contaminant exceedances.

This issue is very important. Contamination in the upper levels of the samples (found in the dredge prism itself) are acceptable, because the material is being taken out of the water and placed aboveground for planned future beneficial uses. However, contaminants found in the lower layer of sediments which would be revealed on the basin floors after dredging, are regulated, and further action would be required from the USACE if the report proved to be correct.

We are in conference with the lab today and tomorrow, and will speak with the organics department tomorrow morning.



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The Sediment Characterization Report has been completed and submitted to the USACE as of the morning of the 8th. Subsequent discussion with the USACE representative (James Holm) for the PSET has occurred, and they are also awaiting the results of our conversations with the laboratory.

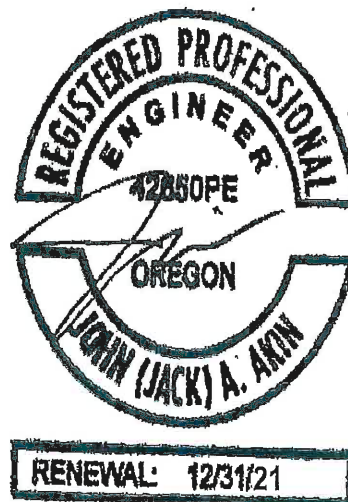
We have had discussions with FEMA, specifically with Greg Jackson (State Project Manager), on March 10. After discussions to be held with Julie Slevin and Douglas Grant (FEMA Project Manager), Mr. Jackson has pledged to contact us with a date for a conference to talk about any requirements, process and procedures going forward. We are targeting next week (week of the 14<sup>th</sup>) for this conference.

It will be my proposal during this conference to separate the construction phase of the overall FEMA project into sub-phases, separating the in-water work from the upland work. The in-water work includes all dredging, and embankment riprap work, with the permitting and environmental considerations involved. The upland work includes all excavating, stormwater system installation, paving, sediment storage area preparation, retaining walls and curbing, etc. The strategy for creating these two sub-phases is to allow for the upland work to proceed during dry season (within the next couple of months, beginning with materials and contract procurement), without being hindered or postponed by permitting and environmental compliance delays associated with the in-water work. Initial reaction to this multi-phased approach from FEMA has been favorable.

We will inform you just as soon as we obtain a prospective schedule for the conference, so that you can participate if you wish.

Sincerely

Jack (John) Akin, MS, PE, IC, HMS, CAI  
EMC-Engineers/Scientists, LLC





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**Engineering Geologist Opinion, emailed to EMC from [Eric@cascadiageotechnical.com](mailto:Eric@cascadiageotechnical.com) on 3/09/22**

“Jack, per our conversation, I would recommend that as part of the engineering on the new warehouse (Site 1) that we do 2 shallow borings to determine depth to groundwater and whether the soils under the building are liquefiable. We can also do standard penetration tests to determine the consistency of the soils at depth and which will augment your penetrometer data. If liquefiable soils are encountered, we can come up with a plan to densify them in situ.

As discussed, I would recommend that we do a proof roll on the Hallmark load area (Site 2) using a comparably loaded rubber-tired vehicle. We can monitor and observe settlement and deflection of the driving surface and observe movement, if any, of the wood support piles. We can also either install tilt plates which we can use to monitor movement of the structure using a portable tiltmeter or set some permanent survey points which can be monitored for elevation changes.

It is my opinion that your assessment regarding the walkway (Site 3) is correct and that a failure surface has developed at the contact of the side cast fill and the native alluvium. This is indicated by separation of the walkway from the roadbed and loading and observed rotation at the toe of the slope. As we discussed, it appears that movement was rotational and that the support piles which are attached to the structure moved with the upper part of the slope. I would suggest we bore 2 or 3 shallow borings into the roadbed to determine where and what our bearing layer is.

I will file this until I hear from you. I dictated part of it using my word program- thanks for the tip, Eric

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Webster reported on projects that were completed in the RV Park, marina, and equipment services that were performed in the month of April.

**D. Port Manager Report – April 2022 - Audio time 14:55**

Dehlinger reported on the wastewater treatment plant, FEMA project budget for improvement and repairs, USDA Rural Development review for Civil Right Compliance

**A motion was made by Jonas and seconded by Speir to approve the management reports Safety & Security Report, Financial Report, Harbormaster Report, and Port Manager Report for April 2022 as discussed. The motion passed 4 – 0.**

**6. ACTION ITEMS**

**A. Billeter Marine Small Construction Project Contract – Audio time 17:28**

Dehlinger reviewed the item with the Board. Port Counsel has created a new contract format for the Port, which Dehlinger suggests using moving forward. There was a discussion regarding adding more pilings to the work contract but was suggested by staff to focus on this one piling and when the work does start to happen, we can look to adding a change order then but there are restrictions on adding to a contract. Port Counsel spoke regarding the contract.

**A motion was made by Speir and seconded by Jonas to approve Billeter Marine Small Construction Project Contract to remove and replace the broken dock pile in Basin 2 O-Dock at finger 22. The motion passed 4 – 0.**

**B. Boat Yard Warehouse Engineering Report – Audio time 24:29**

Dehlinger reviewed that Port Engineer, Jack Akin, has given his final recommendations on the building, with a second opinion from a structural engineer. The Board spoke with Port Counsel regarding the liability of the building. Board and Staff showed concern regarding the current tenants that are occupying the facility and a way to protect the travel lift from the elements.

**A motion was made by Speir and seconded by Jonas to approve the Port Manager to immediately seek funding for a new boat yard building and provide the Board, the funding source, a plan for type of building and potential design, and location for Board approval. Time is of the essence due to the condition of the building. The motion passed 4 – 0.**

**C. Richard Cortez Delinquent Account Write Off Request – Audio time 45:52**

Dehlinger reviewed the history of Mr. Cortez's account to the Board.

**A motion was made by Jonas and seconded by Speir to approve delinquent account write off for \$1,145.69 from accounts receivable and submit Richard Cortez account amount of \$1,145.69 to the Port collection agency. The motion passed 4 – 0.**

**D. Charles Case Delinquent Account Write Off Request – Audio time 51:38**

Dehlinger reviewed the history of Mr. Case's account to the Board.

**A motion was made by Jonas and seconded by Speir to approve delinquent account write off for \$2,637.94 from accounts receivable and submit Charles Case account amount of \$2,637.94 to the Port collection agency. The motion passed 4 – 0.**

**E. Charter & Guide Boat Sign(s) – Audio time 53:12**

Port Counsel discussed with the Board the finding between the lease agreement with Tidewinds and doesn't see any language in the lease that prohibits promoting competitors, but the addendum does prohibit the Port from renting real property or space in the retail area to competitors and doesn't believe that it's prohibiting the Port from promoting competitors on a sign. Dehlinger discussed the design and locations with the Board.

## **ACTION ITEM – B**

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**DATE:** May 18, 2022  
**RE:** Boat Yard Warehouse Engineering Report  
**TO:** Honorable Board President and Harbor District Board Members  
**ISSUED BY:** Gary Dehlinger, Port Manager

---

### OVERVIEW

- Jack Akin/EMC Engineers/Scientists provided his final recommendations including a second opinion from a structural engineer on the condition of the existing boat yard warehouse. Jack's report and structural engineer recommendation are attached for your review and discussion on the plan to move forward.
- There are a few options the Port could decide:
  - Continue renting the space as-is and follow EMC recommendations.
  - Condemn the building and remove all tenants. Leave building vacant until funding is available to repair or replace.
  - Immediately seek funding for repairs and bring the building up to current building codes.
  - Immediately seek funding for a new boat yard building and demo existing building.
- Please note: If FEMA approves the funding for the Kite Field mitigation work for a RV Park expansion, FEMA will not provide the funding for the utilities or additional amenities. If the Port decides to install the utilities and additional amenities, another loan may need to be acquired to complete the project.

### DOCUMENTS

- Email from structural engineer Brian Mockridge, PE, 1 page
- Email from Jack Akin, MS, PE, IC, HMS, CAI, 2 pages
- Jack Akin, EMC Engineers/Scientists Warehouse Condition Report, 11 pages

### COMMISSIONERS ACTION

- **Recommended Motion:**  
Motion to approve the Port Manager to immediately seek funding for a new boat yard building and demo existing building from a public or private lending source. Provide to the Board, the funding source, a plan for type of building and potential design, and location for Board approval. Time is of the essence due to the condition of the building.

**portmanager@portofbrookingsharbor.com**

---

**From:** jack akin <emc@emcengineersscientists.com>  
**Sent:** Friday, April 29, 2022 2:42 PM  
**To:** portmanager@portofbrookingsharbor.com  
**Subject:** FW: Port of Brookings Harbor - Warehouse Pictures

Gary – Brian Mockridge's recommendation below.

Jack Akin, MS, PE, IC, HMS, AI  
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**From:** [Brian Mockridge](#)  
**Sent:** Tuesday, April 5, 2022 3:39 PM  
**To:** 'jack akin'  
**Subject:** RE: Port of Brookings Harbor - Warehouse Pictures

Good afternoon Jack,  
I don't have much doubt that the cost to repair and upgrade the building would exceed the cost of the existing materials that you are saving. There are a couple of things to consider. 1) Many of the structural elements seem to have reached the end of their useful life span, 2) The structure was likely built before/without any structural design and many of the structural components will fail current applied load requirements (Especially ocean wind design pressures). I would recommend demolishing the structure and replacing it with a pre-fabricated steel structure.

Let me know if you have any questions/concerns or if you still want me to schedule a site visit.

Thank you and have a great day,

Brian Mockridge, PE  
PO Box 1395  
Merlin, OR 97532  
541-892-3289

**From:** jack akin <emc@emcengineersscientists.com>  
**Sent:** Monday, April 4, 2022 1:50 PM  
**To:** Brian Mockridge <mockridge121@gmail.com>  
**Subject:** FW: Port of Brookings Harbor - Warehouse Pictures

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[emc@emcengineersscientists.com](mailto:emc@emcengineersscientists.com)

**From:** jack akin <emc@emcengineersscientists.com>  
**Sent:** Thursday, May 5, 2022 11:23 PM  
**To:** portmanager@portofbrookingsharbor.com  
**Cc:** Travis Webster  
**Subject:** POBH Boatyard Warehouse

Gary, Travis

As you know I have completed the inspection and report RE the Boatyard Warehouse.

My observations and recommendations are not very positive. The building is in unsatisfactory condition, and actions as recommended should be taken, or, alternatively, you may decide to accept Mr. Mockridge's recommendation, and my implied recommendation to demolish the building. I don't know if the function of that Warehouse is crucial to the Port. If so, then you may decide to go with Brian's recommendation to replace the Warehouse with a pre-fab steel structure.

And so my opinion concurs with in that expressed by Brian Mockridge, PE, a structural engineer specializing in wooden structures. His opinion from an off-site view of photos provided to him were as follows:

*"Good afternoon Jack,*

*I don't have much doubt that the cost to repair and upgrade the building would exceed the cost of the existing materials that you are saving.*

*There are a couple of things to consider.*

- 1) Many of the structural elements seem to have reached the end of their useful life span,*
- 2) The structure was likely built before/without any structural design and many of the structural components will fail current applied load requirements(Especially ocean wind design pressures).*

*I would recommend demolishing the structure and replacing it with a pre-fabricated steel structure.*

*Let me know if you have any questions/concerns or if you still want me to schedule a site visit.*

*Thank you and have a great day,*

*Brian Mockridge, PE  
PO Box 1395  
Merlin, OR 97532  
541-892-3289"*

Erik Oberbeck, Engineering Geologist, as you both know, was contracted to review the Boatyard Warehouse, the Hallmark Commercial Receiving Dock and the failing Boardwalk section adjacent and south of the northmost gangway access to Basin 1. His comments are below (that pertaining to the Warehouse is emboldened). Erik's comments were RE subsurface liquefaction, and, as you can see, he had nothing to say about the structure itself.

***"Jack, per our conversation, I would recommend that as part of the engineering on the new warehouse (Site 1) that we do 2 shallow borings to determine depth to groundwater and whether the soils under the building are liquefiable. We can also do standard penetration tests to determine the***



**consistency of the soils at depth and which will augment your penetrometer data. If liquefiable soils are encountered, we can come up with a plan to densify them in situ.**

As discussed, I would recommend that we do a proof roll on the Hallmark load area (Site 2) using a comparably loaded rubber-tired vehicle. We can monitor and observe settlement and deflection of the driving surface and observe movement, if any, of the wood support piles. We can also either install tilt plates which we can use to monitor movement of the structure using a portable tiltmeter or set some permanent survey points which can be monitored for elevation changes.

It is my opinion that your assessment regarding the walkway (Site 3) is correct and that a failure surface has developed at the contact of the side cast fill and the native alluvium. This is indicated by separation of the walkway from the roadbed and loading and observed rotation at the toe of the slope. As we discussed, it appears that movement was rotational and that the support piles which are attached to the structure moved with the upper part of the slope. I would suggest we bore 2 or 3 shallow borings into the roadbed to determine where and what our bearing layer is.

I will file this until I hear from you. I dictated part of it using my word program- thanks for the tip,  
Eric

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Best

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- Engineers/Scientists, LLC

5/05/22

Gary Dehlinger, POBH Manager  
Travis Webster, POBH Harbormaster  
Port of Brookings Harbor  
Brookings, OR 97469

## Summary

This 5/3/22 inspection of the Boatyard Warehouse has produced the following findings:

1. Deteriorating column and lateral support has rendered the two buildings comprising the Boatyard Warehouse unsafe without routine and frequent monitoring. Employees work in the building every day. Temporary columns placed to support failing structure do not provide resistance against lateral movement. As defined in IBC 3402.1, the Boatyard Warehouse has suffered Substantial Structural Damage, both to lateral and vertical load-bearing elements of the building.
2. The electrical system in the Boatyard Warehouse presents both hazardous energy and fire hazards. A certified electrical inspection should be required.
3. Concerns exist regarding Accessibility, that is; entry/exit paths that are blocked.
4. Building sheathing is in disrepair. Water damage is and has been occurring throughout the building, and has degraded structural elements.
5. *It is estimated that the adequate repair/renovation of the described hazards for occupational use would not be cost-effective. The approximate remodeling cost is likely to be 50-100 percent of building replacement value.* For example, in order to repair damaged roof support columns and beams (see **Photos 10-1 and 10-2**), sheathing removal, jacking of nearby members, placing a splice or flush beams and columns, reconstruction of framing, etc. would be required. Deterioration via water damage of hidden structural members near beam and rafter supports are likely to exist.



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## Recommendations

1. Implement a bi-weekly visual inspection of temporary columns. Look and annotate any settling or movement of structural supports, overhead beams.
2. Conduct an electrical inspection of all electrical outlets, wiring, etc.
3. Assess fire protection (fire extinguishers, potential ignition sources).
4. Conduct a structural assessment and construct a structural repair plan, including existing and potential water damage, anchoring of walls, adequate protection against wind loading.
5. Stop all sources of water damage (roof and siding sheathing).
6. Assure functionality of man and/or bay doors. At least one, and preferably two, means of entry/exit must remain functional and unblocked at all times for each occupancy.

---

## Introduction

On Tuesday, May 3, Jack Akin of EMC-Engineers/Scientists, LLC (EMC) met with Gary Dehlinger (Port Manager) & Travis Webster (Port Harbormaster) to inspect the two warehouse buildings located in the Boatyard.

## Observations

Observations noted during 5/03 inspection are provided below, citing photos numbered 1 through 24. For the purposes of this report the two adjacent warehouse buildings will be considered to comprise the Boatyard Warehouse.

**Photo 1** shows what could be considered the east front of the Warehouse, showing the general construction of the buildings to be wood frame atop concrete slab, with wood columns supporting beams and rafters, covered by metal sheeting. **Photo 2** shows that the columns in the section of the building shown in Photo 1 are placed in soil, are not treated and are absorbing water. **Photo 3** shows the same column lapped atop with large joist and rafter, fixed by hardware to support roof sheathing. **Photo 4** shows a section of peeled sheathing, which is present at several locations on building sidings and roof. **Photo 5** shows the man-door entry into the west-adjacent building with metal sheeting overlapping the cement block stem wall that is laid upon the concrete slab of that building.



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**Photo 6** shows double stud wall support placed atop the concrete slab. The studs are treated, but nevertheless are not placed upon a mud sill or bottom plate. Bolting to anchor the building to the concrete is generally not seen in this building.

**Photo 7** shows a corroded outside receptacle located on the west side of the Warehouse. **Photo 8** is a view of the south side, somewhat center, of the Warehouse, with bay doors open. **Photo 9** was taken later in the day when that same opening was blocked by a vehicle. **Photos 10 –1** and **10–2** show rotted beams impaled by support columns, pressed by the weight of the roof and wood frame members inside this bay. As shown in **Photo 10–2** some temporary supports are placed to prevent the collapse of that section of the building. However it should be noted that the supports provide no lateral support.

**Photo 11, Photo 12, Photo 15** and **Photo 21–2** all show the general roof support system, characterized by dimensional lumber trusses reinforced with plywood skins, supporting roof and roof ridge boards. Very long, thin joists seem to be used to anchor these trusses against lateral movement. **Photo 13** shows typically narrow mud sills between block and jack-column found at several locations in the Warehouse. **Photos 14** and **17** show the typical minimal framing, sometimes at open spaces filled with cripple stud wall framing, used for nail bars for the metal sheathing.

A number of roof leaks and flooding are indicated by staining and rotted wood members, dramatically demonstrated by **Photo 15**, showing a makeshift wooden interior roof placed by Warehouse workers to protect that particular section from dripping water leaking through the above roofing during storms. As seen in **Photo 16**, doorways are not sealed against the weather. **Photos 18** and **20** show adequately framed mezzanine construction, with two stud corners/bottom plates.

However, in these photos, as well as in **Photos 21–1, 21–2, 21–3** and **21–4**, and elsewhere on other photos in this report, electrical wiring and fixture are certainly not to code, and present a safety hazard (via hazardous energy exposure and fire). Concerns with respect to electrical outlets, wiring, etc. are spoken to below in a bit more detail. **Photo 19** shows the construction practice of stud and columns placed atop untreated mud sills/bottom plates, with no observed anchor bolts.

### **Electrical Service**

Upon inspection it was first noticed that 1900 box connections for receptacles, switches, junctions, etc. with industrial covers and MC connectors, MC cables, conduit fittings with supports, EMT conduit tubing and/or RMC conduit, flex, or even Romax conduit were not present at most locations within the building .



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Loose extension cord-grade wire to lights and other equipment was seen throughout the building. During this brief inspection violations of NEC code pertaining to receptacle outlet grounding, GFCI protection, wall switch outlet controls, adequate weatherproofing, improper wiring of outlets from switches, etc. are prolific.

It is therefore recommended that an electrical inspection as is put forth in OAR. 918-271-0040 be conducted at the warehouse to inspect the appropriateness of the size, placement, protection and termination of service entrance conductors, service equipment, grounding electrode and grounding electrode conductor, bonding, overcurrent protection branch circuits, feeders and, if applicable any underground installations. The inspection should be performed by a person knowledgeable of the National Electric Code (NEC) and the Oregon Electrical Specialty Code (OESC), as applicable. Perhaps needless to say, even if one were to forego a formal inspection, it seems obvious that considerable work needs to be done to bring the existing electrical system in the Warehouse to code.





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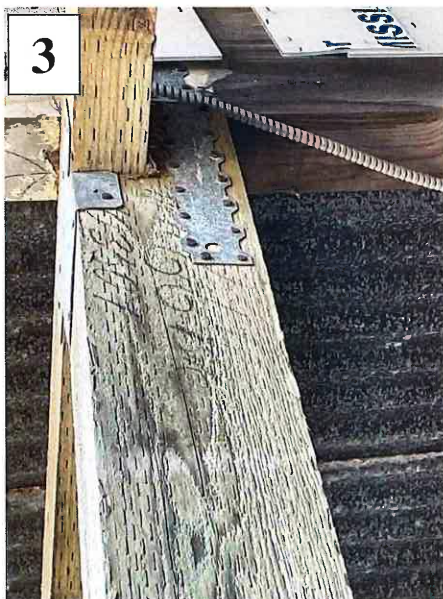
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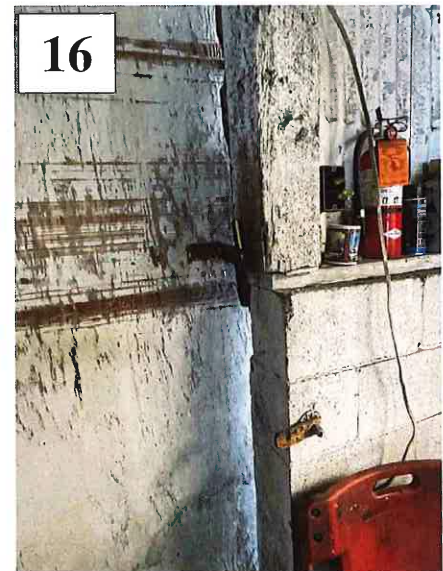
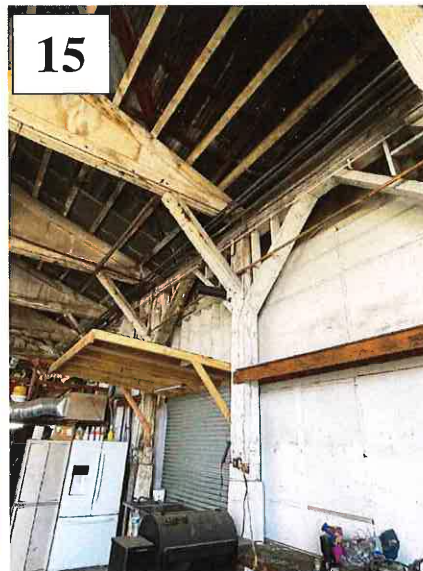
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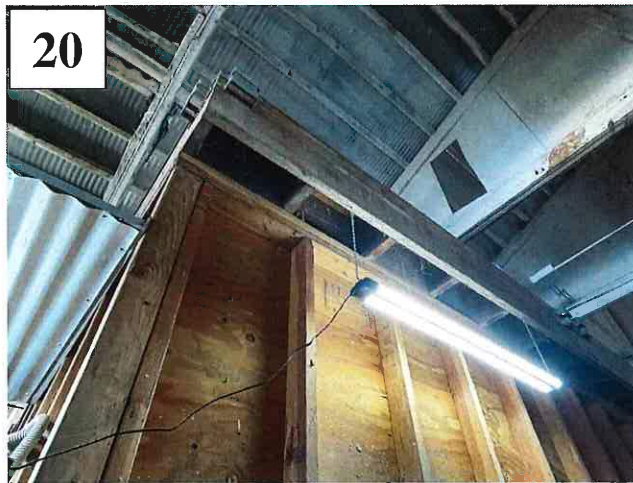
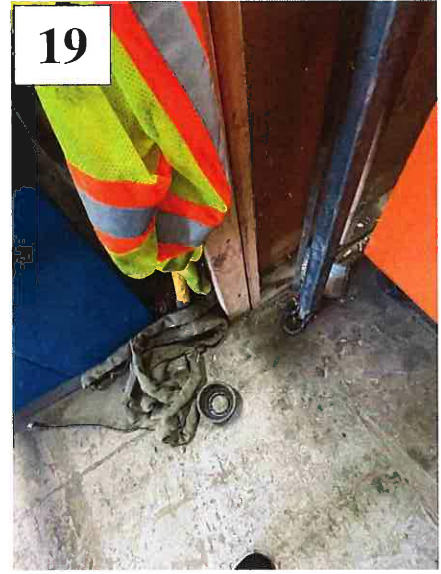
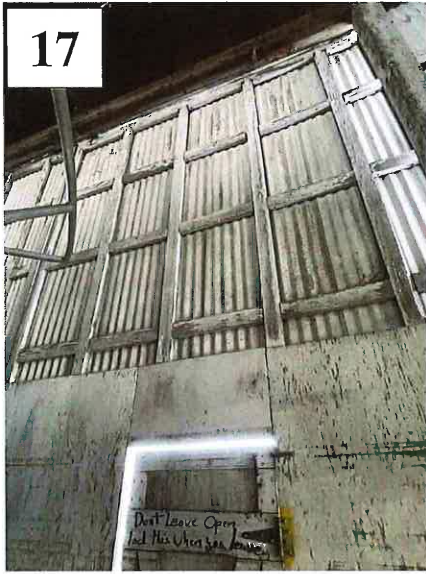
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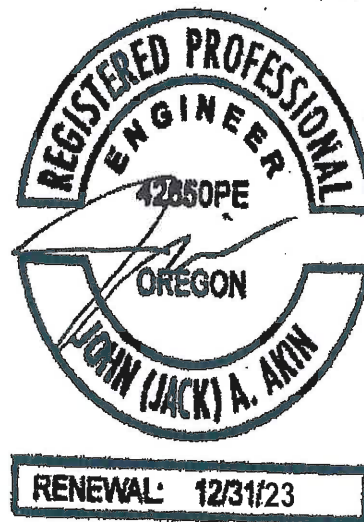
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Sincerely

Jack (John) Akin, MS, PE, IC, HMS, CAI  
EMC-Engineers/Scientists, LLC





A motion was made by Jonas and seconded by Speir to approve Miss Stacey Moorage agreement from January 1, 2022 to December 31, 2022. Update the Board at the November 2022 regular meeting on the status of the vessel for consideration on the next moorage agreement. The motion passed 5 – 0.

**C. Charters and Guides Sign Agreement Form – Audio time 0:44:31**

Dehlinger reviewed this would be for anyone who wants to be on the sign. There was a discussion among the Board and staff of the location of the signs, what sign concept the Board likes, and if they would like a “You are Here” map. The Board allowed public comment.

A motion was made by Heap and seconded by Hartung to approve proceeding with the sign concept design size without “You Are Here” map and locations as discussed and limit the number of signs to 24 individual signs. Sign locations at the RV Park, Boat Ramp and somewhere near the Port Office determined by the Port Manager. The motion passed 4 – 1. Yes: Jonas, Range, Hartung, & Heap. No: Speir.

**7. INFORMATION ITEMS**

**A. BOEM Wind Energy Farm Off the Coast of Brookings Oregon, Presentation by Oregon Trawl Commission – Audio time 1:02:49**

Yelena Nowak, Executive Director of Oregon Trawl Commission gave a presentation to the Board regarding BOEM Offshore Wind Energy Farm off the coast of Brookings Oregon, and the impacts this will have on our fishing fleet. Brad Pettinger, Vice Chair of Pacific Fishery Management Council, Leonard Krug President of Oregon Anglers Alliance and William Goergen Owner of Catalyst Seafood gave the Board their opinion on the Offshore Wind Energy Farm being presented by BOEM. Commissioner Heap informed the Board of his support for the Resolution being presented to the Board. Board agreed to have a Special Meeting the following week to approve the Resolution.

**B. Pacific Seafood Request for Dock Hoist – Audio Time 2:04:52**

Dehlinger informed the Board that the hoist is back in place, the yellow hoist is not used.

**C. Zola’s on the Water Concrete Patio Outside Leased Premises – Audio Time 2:06:18**

Dehlinger just wanted to inform the Board that Zola’s had poured concrete outside of their leased area, didn’t notify Port Management, and a letter has been sent to Zola’s regarding the violation. It was agreed upon the Board and Management that if another violation happens with Zola’s the next letter will come from Port Council terminating their lease.

**D. Cable TV and Wi-Fi at Beachfront RV Park – Audio Time 2:09:26**

Dehlinger asked for the opinion of the Board on Wi-Fi since the Wi-Fi service is not currently covering the whole park and the cable tv is becoming harder and harder to repair. Board agreed to invest in a Wi-Fi system.

**E. USDA Civil Rights Compliance Review & Response – Audio Time 2:11:46**

Dehlinger informed the Board there were some changes that needed to be made in the Port Office and RV Park Office to be compliant with USDA Civil Rights.

**F. Boat Yard Building(s) and Port Office Proposal – Audio Time 2:13:21**

Dehlinger asked for an open discussion regarding what is being proposed, then reviewed the proposal. There was a discussion regarding the loan, and how the money will be recovered. It was suggested to look into quotes for the warehouse building and investigate the other structures at a later date.

**G. RV Park New Fence Dividers – Audio Time 2:33:49**

Dehlinger informed the Board that the RV Park project does not include site dividers and are looking into new fence ideas, and asked for the Boards opinions or different suggestions.

## INFORMATION ITEM — F

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**DATE:** June 15, 2022  
**RE:** Boat Yard Building(s) and Port Office Proposal  
**TO:** Honorable Board President and Harbor District Board Members  
**ISSUED BY:** Gary Dehlinger, Port Manager

---

### OVERVIEW

- The last meeting the Board approved seeking funding to replace the boat yard warehouse and to develop a replacement proposal for Board review.
- Since our last meeting, we have identified another building that needs replacement. This building is the current Port Office. The front half the building is much older than the back section. The front building has serious rot, electrical issues, roof leaks and ADA accessibility concerns. Port staff recommends demolishing the entire building and rebuild a new prefabricated metal building near the Port Shop.
- Our proposal includes four separate prefabricated buildings:
  1. Main Shop Building 60-ft by 205-ft.
  2. Office/Retail Building 25-ft by 100-ft.
  3. Travel Lift Building 50-ft by 50-ft.
  4. Port Office Building 50-ft by 80-ft.
  1. **Main Shop Building** would replace the existing wooden/metal pole barn structure. We are proposing two (2) shops at 40-ft by 60-ft dimensions and five (5) shops at 25-ft by 60-ft dimensions. Port staff discussed these dimensions with our current tenants and that's what they recommended. These spaces could be used for either storage or shop space, but all spaces would be designed for shop use and would be rented at equal rates.
  2. **Office/Retail Building** would be an added structure to accommodate the need for small office or retail space. The spaces would be 20-ft by 25-ft. We notice the need for small office space when Seal Cove Reality space opened up. This building would also provide the restroom facility for the boat yard. These spaces could also be rented for storage, if desired.
  3. **Travel Lift Building** would be a three-sided structure to house the travel lift from weather prolonging the life span and reducing repairs of the equipment.
  4. **Port Office Building** would be a new building. We are proposing a building designed to conduct port business and meet the needs of the staff. This building would have approximately 600 square foot meeting room, six (6) individual office spaces, lobby, copier room, file storage room and restrooms.
- The estimated costs to build these four buildings total \$1,093,300. We figured about 10% for contingency which brings the estimated loan amount to \$1.2 million.
- We contacted a local prefabrication manufacturer for a cursory building estimates, used google search for additional information and personal knowledge of building expenses

for our estimate. It will take six (6) months from the date of order to when we would expect to see the prefabricated buildings on site.

- We are proposing to Request for Proposal (RFP) for the prefabricated buildings and RFP for a general contractor to install and complete the buildings for occupancy.
- Preliminary schedule would be this:

Dates		Description
June 2022	July 2022	Secure Loan from Public or Private Source
June 2022	July 2022	Board Approval on Design and Project
July 2022	August 2022	RFP for Pre-Engineered Metal Buildings (PEMB)
September 2022	October 2022	Award & Order PEMB / Funding Completed
October 2022	March 2023	Order Pre-Engineered Metal Building (PEMB) & Delivery
November 2022	December 2022	RFP General Contractor to build PEMB
January 2023		Award General Contractor
March 2023	May 2023	Erect PEMB #1, #3 & #4
May 2023	June 2023	Tenants from old building move into new building(s)
June 2023	July 2023	Demolition of old building(s)
July 2023	August 2023	Erect PEMB #2
June 2023	August 2023	Asphalt-Surface Work / Project Completed

This schedule is subject to change due to either funding issues, delivery-supply chain issues, and contractor scheduling.

- With our current rental rates and proposed building layouts, the new income would pay for the loan at 4% APR and have a Return on Investment at 31%. We believe achieving 100% occupancy within the first year after completion is doable at this current economy.
- The existing tenants have verbally shown interest to move into the new building.

Other Port repair projects that we will need to consider for funding include (not in any order of importance):

1. Electrical infrastructure to the docks and on the docks (including pedestals)
2. RV Park paving
3. Retail Roof repairs
4. Boardwalk repair
5. Basin 2 dock replacement (reconfiguration)
6. Travel Lift ramp replacement
7. RV Park Improvements (back row)
8. Receiving Docks repair / replacements
9. Basins Slope repairs

Other Port Projects that we may need to consider for funding include (not in any order of importance):

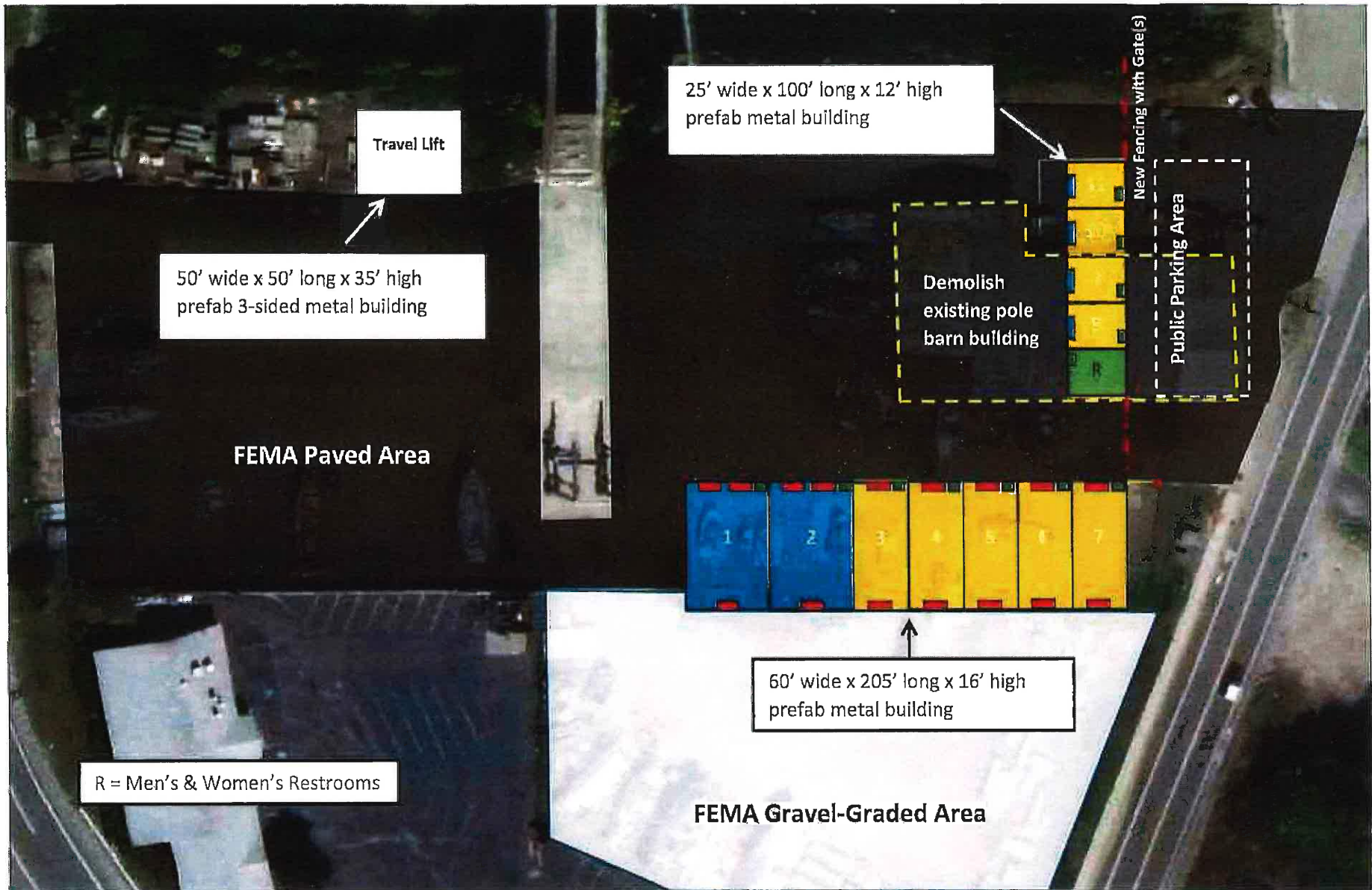
1. Wastewater Treatment Plant matching
2. RV Park expansion to Kite Field for utilities and amenities
3. Storage Building Facility
4. Commercial Retail Expansion



## DOCUMENTS

- Proposed Boat Yard Layout, 1 page
- Proposed Port Office Layout, 1 page
- Proposed Buildings Procurement, 1 page
- Estimated Building Costs, 7 pages
- Estimated revenue for 100% and 75% occupancy, 2 pages
- Amortization Calculator at 4% APR, 1 page
- Return on Investment Calculator at 4% APR, 1 page
- Amortization Calculator at 5% APR, 1 page
- Return on Investment Calculator at 5% APR, 1 page
- Strategic Business Plan Table 14 – Capital Improvement Plan November 2021, 1 page

# Port of Brookings Harbor - Proposed New Boat Yard Layout



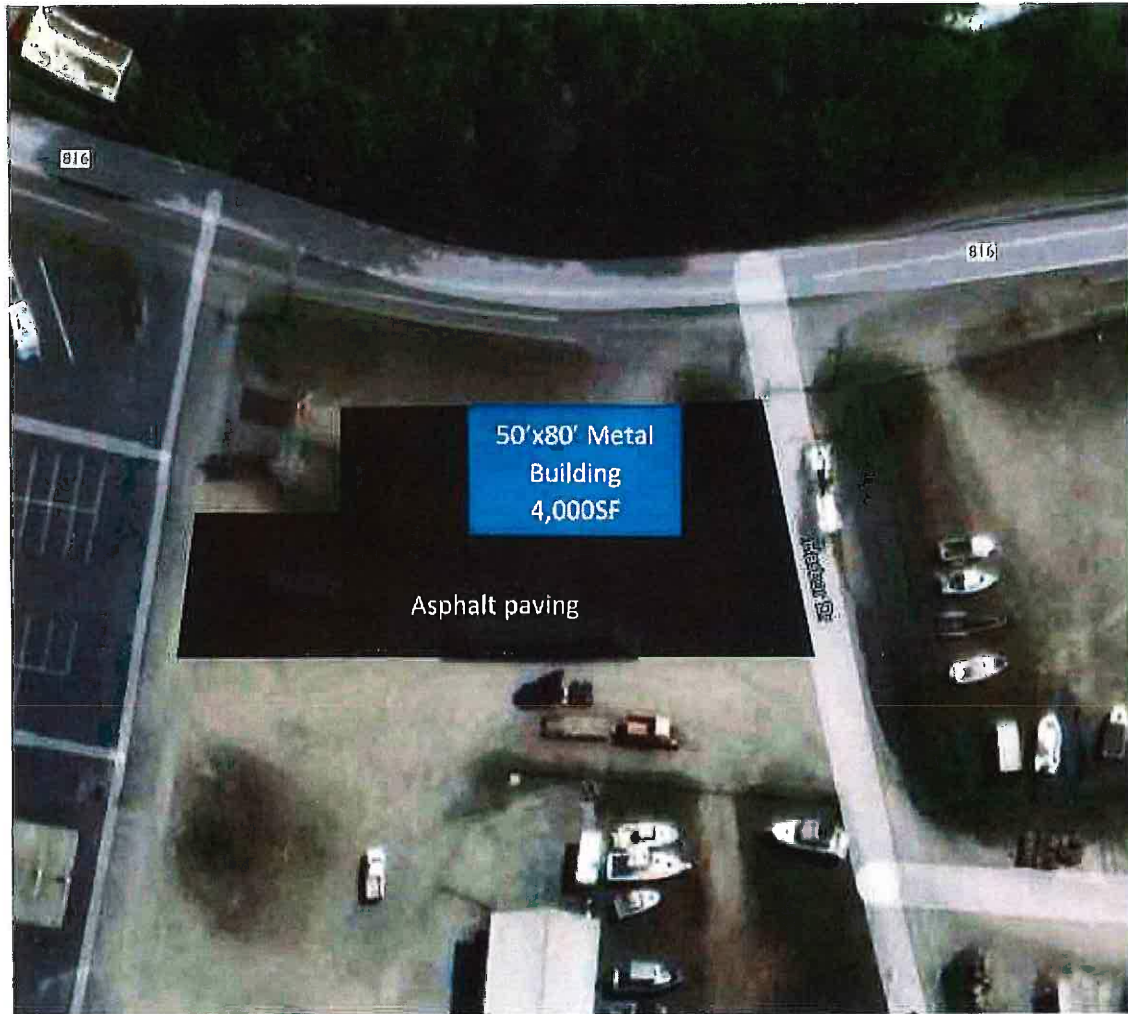
12' wide x 14' high roll-up door

Walk-in Door

10' wide x 8' high roll-up door

/ Spaces 1 & 2 = 40'x60' / Spaces 3 - 7 25'x60' / Spaces 8 - 11 20'x25'

## Proposed New Port Office Location





# Proposed Procurement

Procurement for boat yard and Port Office buildings:

Proposing three (3) prefabricated metal buildings to replace the existing pole barn structure located at 16060 Lower Harbor Road, Brookings OR 97415. Proposing one (1) prefabricated metal building to replace the existing Port Office at 16330 Lower Harbor Road, Brookings OR 97415.

The main prefabricated metal building would provide boat and automotive type of repair shops and/or storage of various materials or vehicles. Size of this building would be approximately 60-ft wide by 205-ft long and 16-ft high. The building would have up to seven (7) independent spaces. Two (2) spaces would be 40-ft by 60-ft, five (5) spaces would be 25-ft by 60-ft. Sixteen (16) roll-up type doors with dimensions of 12-ft wide and 14-ft high. Seven (7) walk-in doors. Each individual space to have independent power supply with proper outlets and shop lighting. Fire sprinkler system per NFPA 13. Divider walls constructed of wood or metal studs with plane drywall finish. This building will need to meet all ADA accessibilities.

The second prefabricated metal building would provide office or storage type of spaces. Size of this building would be approximately 25-ft by 100-ft and 12-ft high. The building would have five (5) independent spaces. Four (4) spaces would be 20-ft by 25-ft, one (1) space would be 20-ft by 25-ft for a restroom designed for unisex. Four (4) roll-up type doors with dimensions of 10-ft wide and 8-ft high. Five (5) walk-in doors. Each individual space to have independent power supply with proper outlets and office or shop lighting. Divider walls constructed of wood or metal studs with plane drywall finish. This building will need to meet all ADA accessibilities including restroom. Tie-in existing sewer and water plumbing for the restroom.

The third prefabricated metal building is a three-side building to store the Port's travel lift. Size of this building would be approximately 50-ft wide by 50-ft long and 35-ft high.

The fourth prefabricated metal building would provide the Port a new office to meet the needs of Port Commissioners and staff at 16282 Lower Harbor Road. The size of this building would be approximately 50-ft by 80-ft and 10-ft high. This building would have nine (9) interior rooms (office space & public meeting room) and two (2) restrooms. Divider walls constructed of wood or metal studs with plane drywall finish. Fully furnished with electrical, power and sewer utilities.

## Optional Quote:

Demolition of existing pole barn structure approximately 12,000 square feet. Wood frame with metal and masonry block siding and metal roof. Disposal of wood, metal, and masonry block. Leave existing concrete floor/subgrade in place.

Demolition of existing Port Office building approximately 1,500 square feet wood framed building and disconnect all utilities.

Description	Estimated Unit Cost	UOM	QTY	Cost
Building #1 Prefab Metal Building 60'x205' - 7 Units	19	SF	12,300	233,700
Fire Sprinkler System for Building #1	2	SF	12,300	24,600
Building #2 Prefab Metal Building 25'x100'	19	SF	2,500	47,500
Building #3 Prefab Metal Building 50'x50' Travel Lift	23	SF	2,500	57,500
Building #4 Port Office 50'x80'	19	SF	4,000	76,000
Engineering Plug Price	15,000	LS	1	15,000
Electrical Plug Price	200,000	LS	1	200,000
Insulation (Included)	-	LS	-	-
Plumbing	25,000	LS	1	25,000
Roll-up Doors	1,500	EA	20	30,000
Storm Drain Plug Price (none)	-	LS	1	-
Street Improvements Plug Price (none)	-			-
Concrete	160	CY	500	80,000
Asphalt	5	SF	7,500	37,500
Permits	10,000	LS	1	10,000
Erection of Metal Buildings	5	SF	21,300	106,500
Drywall (firewall insulation between units)	2	SF	30,000	60,000
Demo Existing Buildings - Plug Price	1	LS	50,000	50,000
Heating/Air System for Building #4	1	LS	40,000	40,000
	Subtotal			1,093,300
	10% Contingency			109,330
	Estimated Total			1,202,630

<b>Total Loan Amount Estimated</b>	<b>1,200,000</b>
------------------------------------	------------------

Monthly Expenses			
	4% APR	5% APR	
Loan to Finance Construction	6,334.04	7,015.08	
Electrical Monthly	250	250	
Insurance Monthly	1,000	1,000	
Overhead Monthly	100	100	
Maintenance Monthly	400	400	
Estimated Monthly Expenses	8,084	8,765	
Annual Expenses	97,008	105,181	
Expenses 25 Years	2,425,212	2,629,524	

Building cost - \$17,475.00 (\$6.78 - \$10.24 per square foot) · Accessories - \$3,700.00 (10% to 28% of the cost) · Monolithic Foundation - (\$14,900) \$8 per square ...

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If your project is new construction, expect to pay \$1 to \$2 per square foot of coverage. A high-rise building will be more expensive, averaging \$2 to \$4 per square foot of coverage. Existing buildings that will be retrofitted can average \$2–\$7 per square foot of coverage.

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## What Is the Cost of a Commercial Fire Sprinkler System?

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## Fire Sprinkler System Installation Cost Calculator [2022]

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**Any building more than 55 feet in height must have automatic sprinkler systems installed throughout the structure. Self-storage facilities are also required to have automatic sprinklers installed, unless it's a one-story building with no interior corridors and which contains a one-hour fire barrier.** May 18, 2020

[https://www.carportcentral.com/blog/should-you-install...](https://www.carportcentral.com/blog/should-you-install-fire-sprinklers-in-your-metal-building/)

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<https://nfsa.org/wp-content/uploads/2018/03/Fire-Sprinkler-Guide-IBC-2015.pdf>

## Fire-Sprinkler-Guide-IBC-2015.pdf

Complete Sprinkler Requirements. The following paragraphs outline where complete sprinkler systems are required: Sprinklers are required whenever the floor ...  
43 pages

<https://www.keystonefire.com/blog/when-are-fire-sprinkler-systems-required/>

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<https://www.pwasteelbuildings.com/blog/why-install-fire-sprinklers-in-your-steel-building/>

## Why Install Fire Sprinklers - %% - PWS Steel Buildings

Mar 22, 2019 — Adding a sprinkler system to your steel building has multiple benefits: abatement for fire-resistant building materials, a likely decrease ...

<http://qcode.us/codes/temecula/view/15.04.020-california-building-code>

## 15.04.020 California Building Code.

Fire sprinkler systems shall be installed in mobile homes, manufactured homes and multifamily manufactured homes with two dwelling units in accordance with ...

<https://www.elephantbarns.com/install-a-fire-sprinkler-in-your-steel-barn/>

## Install a Fire Sprinkler System in Your Steel Barn

Mar 14, 2017 — One step that may seem extreme but is sure to help in the event of a fire is to install a fire sprinkler system into your metal barn or garage.

2 Percent CPI Average Increase for 25 Years - 100% Occupancy

Shop/Storage Spaces				
Years	Sq Ft	Price/SF	Revenue/Mo	Revenue/Yr
1	12,300	0.58	7,134.00	85,608.00
2	12,300	0.59	7,276.68	87,320.16
3	12,300	0.60	7,422.21	89,066.56
4	12,300	0.62	7,570.66	90,847.89
5	12,300	0.63	7,722.07	92,664.85
6	12,300	0.64	7,876.51	94,518.15
7	12,300	0.65	8,034.04	96,408.51
8	12,300	0.67	8,194.72	98,336.68
9	12,300	0.68	8,358.62	100,303.42
10	12,300	0.69	8,525.79	102,309.48
11	12,300	0.71	8,696.31	104,355.67
12	12,300	0.72	8,870.23	106,442.79
13	12,300	0.74	9,047.64	108,571.64
14	12,300	0.75	9,228.59	110,743.08
15	12,300	0.77	9,413.16	112,957.94
16	12,300	0.78	9,601.42	115,217.10
17	12,300	0.80	9,793.45	117,521.44
18	12,300	0.81	9,989.32	119,871.87
19	12,300	0.83	10,189.11	122,269.30
20	12,300	0.84	10,392.89	124,714.69
21	12,300	0.86	10,600.75	127,208.98
22	12,300	0.88	10,812.76	129,753.16
23	12,300	0.90	11,029.02	132,348.23
24	12,300	0.91	11,249.60	134,995.19
25	12,300	0.93	11,474.59	137,695.10
			2,742,049.90	

Office/Retail Spaces				
Years	Sq Ft	Price/SF	Revenue/Mo	Revenue/Yr
1	2,000	1	2,000.00	24,000.00
2	2,000	1.02	2,040.00	24,480.00
3	2,000	1.04	2,080.80	24,969.60
4	2,000	1.06	2,122.42	25,468.99
5	2,000	1.08	2,164.86	25,978.37
6	2,000	1.10	2,208.16	26,497.94
7	2,000	1.13	2,252.32	27,027.90
8	2,000	1.15	2,297.37	27,568.46
9	2,000	1.17	2,343.32	28,119.83
10	2,000	1.20	2,390.19	28,682.22
11	2,000	1.22	2,437.99	29,255.87
12	2,000	1.24	2,486.75	29,840.98
13	2,000	1.27	2,536.48	30,437.80
14	2,000	1.29	2,587.21	31,046.56
15	2,000	1.32	2,638.96	31,667.49
16	2,000	1.35	2,691.74	32,300.84
17	2,000	1.37	2,745.57	32,946.86
18	2,000	1.40	2,800.48	33,605.79
19	2,000	1.43	2,856.49	34,277.91
20	2,000	1.46	2,913.62	34,963.47
21	2,000	1.49	2,971.89	35,662.74
22	2,000	1.52	3,031.33	36,375.99
23	2,000	1.55	3,091.96	37,103.51
24	2,000	1.58	3,153.80	37,845.58
25	2,000	1.61	3,216.87	38,602.49
			768,727.19	

Total Revenue from both buildings first Month	9,134.00
---	----------

Total Revenue from both buildings in 25 Years	3,510,777.09
---	--------------



2 Percent CPI Average Increase for 25 Years - 75% Occupancy

Shop/Storage Spaces				
Years	Sq Ft	Price/SF	Revenue/Mo	Revenue/Yr
1	9,225	0.58	5,350.50	64,206.00
2	9,225	0.59	5,457.51	65,490.12
3	9,225	0.60	5,566.66	66,799.92
4	9,225	0.62	5,677.99	68,135.92
5	9,225	0.63	5,791.55	69,498.64
6	9,225	0.64	5,907.38	70,888.61
7	9,225	0.65	6,025.53	72,306.38
8	9,225	0.67	6,146.04	73,752.51
9	9,225	0.68	6,268.96	75,227.56
10	9,225	0.69	6,394.34	76,732.11
11	9,225	0.71	6,522.23	78,266.76
12	9,225	0.72	6,652.67	79,832.09
13	9,225	0.74	6,785.73	81,428.73
14	9,225	0.75	6,921.44	83,057.31
15	9,225	0.77	7,059.87	84,718.45
16	9,225	0.78	7,201.07	86,412.82
17	9,225	0.80	7,345.09	88,141.08
18	9,225	0.81	7,491.99	89,903.90
19	9,225	0.83	7,641.83	91,701.98
20	9,225	0.84	7,794.67	93,536.02
21	9,225	0.86	7,950.56	95,406.74
22	9,225	0.88	8,109.57	97,314.87
23	9,225	0.90	8,271.76	99,261.17
24	9,225	0.91	8,437.20	101,246.39
25	9,225	0.93	8,605.94	103,271.32
				2,056,537.42

Office/Retail Spaces				
Years	Sq Ft	Price/SF	Revenue/Mo	Revenue/Yr
1	1,500	1	1,500.00	18,000.00
2	1,500	1.02	1,530.00	18,360.00
3	1,500	1.04	1,560.60	18,727.20
4	1,500	1.06	1,591.81	19,101.74
5	1,500	1.08	1,623.65	19,483.78
6	1,500	1.10	1,656.12	19,873.45
7	1,500	1.13	1,689.24	20,270.92
8	1,500	1.15	1,723.03	20,676.34
9	1,500	1.17	1,757.49	21,089.87
10	1,500	1.20	1,792.64	21,511.67
11	1,500	1.22	1,828.49	21,941.90
12	1,500	1.24	1,865.06	22,380.74
13	1,500	1.27	1,902.36	22,828.35
14	1,500	1.29	1,940.41	23,284.92
15	1,500	1.32	1,979.22	23,750.62
16	1,500	1.35	2,018.80	24,225.63
17	1,500	1.37	2,059.18	24,710.14
18	1,500	1.40	2,100.36	25,204.35
19	1,500	1.43	2,142.37	25,708.43
20	1,500	1.46	2,185.22	26,222.60
21	1,500	1.49	2,228.92	26,747.05
22	1,500	1.52	2,273.50	27,281.99
23	1,500	1.55	2,318.97	27,827.63
24	1,500	1.58	2,365.35	28,384.19
25	1,500	1.61	2,412.66	28,951.87
				576,545.40

Total Revenue from both buildings first Month	6,850.50
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Total Revenue from both buildings in 25 Years	2,633,082.82
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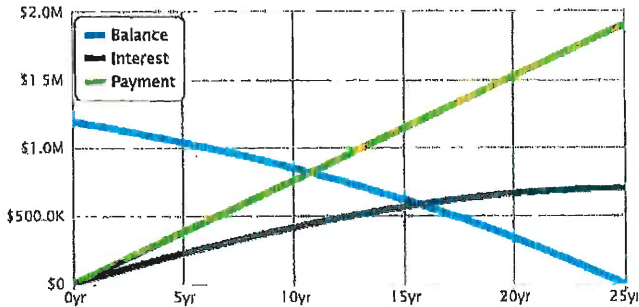
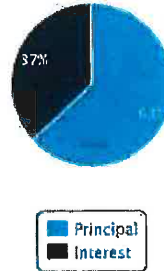
## Amortization Calculator

Loan Amount	1200000
Loan Term	25 years
Interest Rate (APR)	4
<b>Calculate</b>	

**Monthly Pay: \$6,334.04**

Total of 300 Loan Payments \$1,900,212.63

Total Interest \$700,212.63

**Loan Amortization Graph****Payment Breakdown**
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## Annual Amortization Schedule

**Annual Schedule** | **Monthly Schedule**

	Beginning Balance	Interest	Principal	Ending Balance
1	\$1,200,000.00	\$47,480.76	\$28,527.72	\$1,171,472.26
2	\$1,171,472.26	\$46,318.51	\$29,689.97	\$1,141,782.25
3	\$1,141,782.25	\$45,108.88	\$30,899.60	\$1,110,882.63
4	\$1,110,882.63	\$43,849.97	\$32,158.51	\$1,078,724.10
5	\$1,078,724.10	\$42,539.78	\$33,466.70	\$1,045,255.39
6	\$1,045,255.39	\$41,176.23	\$34,832.25	\$1,010,423.12
7	\$1,010,423.12	\$39,757.11	\$36,251.37	\$974,171.72
8	\$974,171.72	\$38,280.19	\$37,728.29	\$936,443.39
9	\$936,443.39	\$36,743.07	\$39,265.41	\$897,177.94
10	\$897,177.94	\$35,143.33	\$40,865.15	\$856,312.78
11	\$856,312.78	\$33,478.41	\$42,530.07	\$813,782.67
12	\$813,782.67	\$31,745.68	\$44,262.80	\$769,519.84
13	\$769,519.84	\$29,942.34	\$46,066.14	\$723,453.67
14	\$723,453.67	\$28,085.53	\$47,942.95	\$675,510.69
15	\$675,510.69	\$26,112.25	\$49,896.23	\$625,614.44
16	\$625,614.44	\$24,079.41	\$51,929.07	\$573,685.35
17	\$573,685.35	\$21,963.74	\$54,044.74	\$519,640.58
18	\$519,640.58	\$19,761.88	\$56,246.60	\$463,393.94
19	\$463,393.94	\$17,470.29	\$58,538.19	\$404,855.73
20	\$404,855.73	\$15,085.35	\$60,923.13	\$343,932.59
21	\$343,932.59	\$12,603.24	\$63,405.24	\$280,527.34
22	\$280,527.34	\$10,020.03	\$65,988.45	\$214,538.86
23	\$214,538.86	\$7,331.55	\$68,676.93	\$145,861.91
24	\$145,861.91	\$4,533.54	\$71,474.94	\$74,386.95
25	\$74,386.95	\$1,621.54	\$74,386.94	\$0.00

While the Amortization Calculator can serve as a basic tool for most, if not all, amortization calculations, there are other calculators available on this website that are more specifically geared for common amortization calculations.

[Mortgage Calculator](#)[Auto Loan Calculator](#)

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## Return on Investment (ROI) Calculator

Amount Invested

Amount Returned

Investment Time:  
☐ Use Dates ☐ Use Length

Investment Length  years

### Result

Investment Gain	\$1,085,565.00
ROI	44.76%
Annualized ROI	1.49%
Investment Length	25.00 years



4% APR

 Search

### Related:

[Investment Calculator](#) | [Average Return Calculator](#)

In finance, Return on Investment, usually abbreviated as ROI, is a common, widespread metric used to evaluate the forecasted profitability on different investments. Before any serious investment opportunities are even considered, ROI is a solid base from which to go forth. The metric can be applied to anything from stocks, real estate, employees, to even a sheep farm; anything that has a cost with the potential to derive gains from can have an ROI assigned to it. While much more intricate formulas exist to help calculate the rate of return on investments accurately, ROI is lauded and still widely used due to its simplicity and broad usage as a quick-and-dirty method. Many money-making schemes involve several businessmen seated at a table during lunch talking about potential investments until one of them exclaims about one with a very high ROI after doing the calculations on a napkin.

ROI may be confused with ROR, or rate of return. Sometimes, they can be used interchangeably, but there is a big difference: ROR can denote a period of time, often annually, while ROI doesn't.

The basic formula for ROI is:

$$\text{ROI} = \frac{\text{Gain from Investment} - \text{Cost of Investment}}{\text{Cost of Investment}}$$

As a most basic example, Bob wants to calculate the ROI on his sheep farming operation. From the beginning until the present, he invested a total of \$50,000 into the project, and his total profits to date sum up to \$70,000.

$$\frac{\$70,000 - \$50,000}{\$50,000} = 40\%$$

Bob's ROI on his sheep farming operation is 40%. Conversely, the formula can be used to compute either gain from or cost of investment, given a desired ROI. If Bob wanted an ROI of 40% and knew his initial cost of investment was \$50,000, \$70,000 is the gain he must make from the initial investment to realize his desired ROI.

### Difficulty in Usage

It is true that ROI as a metric can be utilized to gauge the profitability of almost anything. However, its universal applicability is also the reason why it tends to be difficult to use properly. While the ROI formula itself may be simple, the real problem comes from people not understanding how to arrive at the correct definition for 'cost' and/or 'gain', or the variability involved. For instance, for a potential real estate property, investor A might calculate the ROI involving capital expenditure, taxes, and insurance, while investor B might only use the purchase price. For a potential stock, investor A might calculate ROI including taxes on capital gains, while investor B may not. Also, does an ROI calculation involve every cash flow in the middle other than the first and the last? Different investors use ROI differently.

However, the biggest nuance with ROI is that there is no timeframe involved. Take, for instance, an investor with an investment decision between a diamond with an ROI of 1,000% or a piece of land with an ROI of 50%. Right off the bat, the diamond seems like the no-brainer, but is it true if the ROI is calculated over 50 years for the diamond as opposed to the land's ROI calculated over several months? This is why ROI does its job well as a base for evaluating investments, but it is essential to supplement it further with other, more accurate measures.

### Annualized ROI

### Financial Calculators

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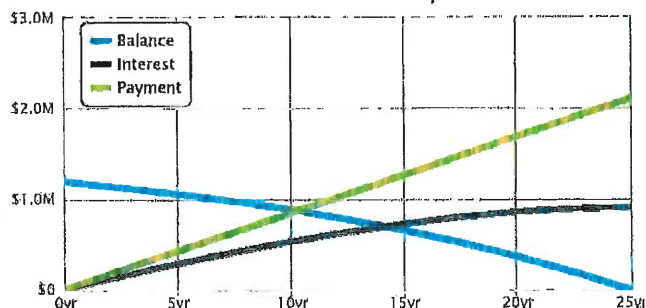
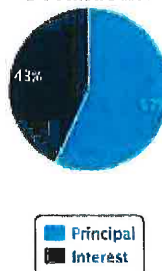
## Amortization Calculator

Loan Amount	1200000
Loan Term	25 years
Interest Rate (APR)	5
<b>Calculate</b>	

**Monthly Pay. \$7,015.08**

Total of 300 Loan Payments \$2,104,524.15

Total Interest \$904,524.15

**Loan Amortization Graph****Payment Breakdown** Search**Financial Calculators**

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## Annual Amortization Schedule

Annual Schedule

Monthly Schedule

	Beginning Balance	Interest	Principal	Ending Balance
1	\$1,200,000.00	\$58,438.08	\$24,742.88	\$1,175,257.12
2	\$1,175,257.12	\$58,172.20	\$26,008.76	\$1,149,248.34
3	\$1,149,248.34	\$56,841.53	\$27,339.43	\$1,121,908.91
4	\$1,121,908.91	\$55,442.81	\$28,738.15	\$1,093,170.74
5	\$1,093,170.74	\$53,972.51	\$30,208.45	\$1,062,962.27
6	\$1,062,962.27	\$52,426.96	\$31,754.00	\$1,031,208.28
7	\$1,031,208.28	\$50,802.38	\$33,378.58	\$997,829.69
8	\$997,829.69	\$49,094.67	\$35,086.29	\$962,743.39
9	\$962,743.39	\$47,299.60	\$36,881.36	\$925,862.01
10	\$925,862.01	\$45,412.67	\$38,768.29	\$887,093.71
11	\$887,093.71	\$43,429.20	\$40,751.76	\$846,341.94
12	\$846,341.94	\$41,344.26	\$42,836.70	\$803,505.25
13	\$803,505.25	\$39,152.67	\$45,028.29	\$758,476.94
14	\$758,476.94	\$36,848.92	\$47,332.04	\$711,144.90
15	\$711,144.90	\$34,427.32	\$49,753.64	\$661,391.26
16	\$661,391.26	\$31,881.83	\$52,299.13	\$609,092.13
17	\$609,092.13	\$29,206.13	\$54,974.83	\$554,117.28
18	\$554,117.28	\$26,393.49	\$57,787.47	\$496,329.82
19	\$496,329.82	\$23,436.68	\$60,743.98	\$435,585.83
20	\$435,585.83	\$20,329.20	\$63,851.76	\$371,734.07
21	\$371,734.07	\$17,062.44	\$67,118.52	\$304,615.53
22	\$304,615.53	\$13,628.51	\$70,552.45	\$234,063.08
23	\$234,063.08	\$10,018.92	\$74,162.04	\$159,901.03
24	\$159,901.03	\$6,224.64	\$77,958.32	\$81,944.71
25	\$81,944.71	\$2,236.27	\$81,944.69	\$0.00

While the Amortization Calculator can serve as a basic tool for most, if not all, amortization calculations, there are other calculators available on this website that are more specifically geared for common amortization calculations.

[Mortgage Calculator](#)[Auto Loan Calculator](#)

[home / financial / roi calculator](#)

## Return on Investment (ROI) Calculator

Amount Invested	<input type="text" value="2629524"/>
Amount Returned	<input type="text" value="3510777"/>
Investment Time:	<input type="radio"/> Use Dates <input type="radio"/> Use Length
Investment Length	<input type="text" value="25"/> years
<input type="button" value="Calculate"/>	

### Result

Investment Gain	<b>\$881,253.00</b>
ROI	<b>33.51%</b>
Annualized ROI	<b>1.16%</b>
Investment Length	25.00 years



5% APR

 Search

### Related:

[Investment Calculator](#) | [Average Return Calculator](#)

In finance, Return on Investment, usually abbreviated as ROI, is a common, widespread metric used to evaluate the forecasted profitability on different investments. Before any serious investment opportunities are even considered, ROI is a solid base from which to go forth. The metric can be applied to anything from stocks, real estate, employees, to even a sheep farm; anything that has a cost with the potential to derive gains from can have an ROI assigned to it. While much more intricate formulas exist to help calculate the rate of return on investments accurately, ROI is lauded and still widely used due to its simplicity and broad usage as a quick-and-dirty method. Many money-making schemes involve several businessmen seated at a table during lunch talking about potential investments until one of them exclaims about one with a very high ROI after doing the calculations on a napkin.

ROI may be confused with ROR, or rate of return. Sometimes, they can be used interchangeably, but there is a big difference: ROR can denote a period of time, often annually, while ROI doesn't.

The basic formula for ROI is:

$$\text{ROI} = \frac{\text{Gain from Investment} - \text{Cost of Investment}}{\text{Cost of Investment}}$$

As a most basic example, Bob wants to calculate the ROI on his sheep farming operation. From the beginning until the present, he invested a total of \$50,000 into the project, and his total profits to date sum up to \$70,000.

$$\frac{\$70,000 - \$50,000}{\$50,000} = 40\%$$

Bob's ROI on his sheep farming operation is 40%. Conversely, the formula can be used to compute either gain from or cost of investment, given a desired ROI. If Bob wanted an ROI of 40% and knew his initial cost of investment was \$50,000, \$70,000 is the gain he must make from the initial investment to realize his desired ROI.

### Difficulty in Usage

It is true that ROI as a metric can be utilized to gauge the profitability of almost anything. However, its universal applicability is also the reason why it tends to be difficult to use properly. While the ROI formula itself may be simple, the real problem comes from people not understanding how to arrive at the correct definition for 'cost' and/or 'gain', or the variability involved. For instance, for a potential real estate property, investor A might calculate the ROI involving capital expenditure, taxes, and insurance, while investor B might only use the purchase price. For a potential stock, investor A might calculate ROI including taxes on capital gains, while investor B may not. Also, does an ROI calculation involve every cash flow in the middle other than the first and the last? Different investors use ROI differently.

However, the biggest nuance with ROI is that there is no timeframe involved. Take, for instance, an investor with an investment decision between a diamond with an ROI of 1,000% or a piece of land with an ROI of 50%. Right off the bat, the diamond seems like the no-brainer, but is it true if the ROI is calculated over 50 years for the diamond as opposed to the land's ROI calculated over several months? This is why ROI does its job well as a base for evaluating investments, but it is essential to supplement it further with other, more accurate measures.

### Annualized ROI

### Financial Calculators

<a href="#">Mortgage</a>	<a href="#">Loan</a>
<a href="#">Auto Loan</a>	<a href="#">Interest</a>
<a href="#">Payment</a>	<a href="#">Retirement</a>
<a href="#">Amortization</a>	<a href="#">Investment</a>
<a href="#">Currency</a>	<a href="#">Inflation</a>
<a href="#">Finance</a>	<a href="#">Mortgage Payoff</a>
<a href="#">Income Tax</a>	<a href="#">Compound Interest</a>
<a href="#">Salary</a>	<a href="#">401K</a>
<a href="#">Interest Rate</a>	<a href="#">Sales Tax</a>
<a href="#">More Financial Calculators</a>	

[Financial](#) | [Fitness and Health](#) | [Math](#) | [Other](#)

**6.1 Capital Facilities Plan.** The Port has identified short-, mid-, and long-term capital improvement projects to facilitate the continued success of its operations and facilities. Table 14 lists potential projects, their timeframes, and planning level cost estimates for them.

**Table 14 - Capital Improvement Plan**

	Capital Improvements	2021 Cost Estimates	Timeline	2021-22 Priority	Fund Source	Priority Project Category	
1	RV Park Facility Improvements	Front row RV site improvements	\$657,000	2021-22	High	Port	Recreation Improvements / public amenities
2	Transient Dock Power Building	Rebuild transient dock power source supply	\$75,000	2022-23	High	Port	Marina facility upgrade
3	Wastewater Treatment Plant	Construct wastewater treatment plant for Port industrial and commercial facilities	\$3,500,000	2022-23	High	EPA / Port / Private	Commercial facility upgrade
4	Basins 1 and 2 Dredging & Basin 2 Slope Repair	Basins 1 and 2 dredging and Basin 2 slope repairs	\$1,700,000	2022-24	Extreme	FEMA - HMGP - Business Oregon	2019 Storm related damage
5	Stormwater Drainage and Paving Gear Storage, Boat Yard & Kite Field Areas	Stormwater improvements; grading and paving	\$2,000,000	2022-24	Extreme	FEMA - HMGP - Business Oregon	2019 Storm related damage
6	RV Park Facility Expansion on Kite Field (part of FEMA Projects above)	Develop utilities for RV camping with laundromat & possible mobile food service area	\$300,000	2022-24	High	Port	Recreation Improvements / public amenities
7	RV Park Paving	Paving and stormwater improvements	\$500,000	2023-24	High	HMGP / OSPR / Port	Recreation Improvements / public amenities
8	Retail Bld # 1 Roof Replacement	Retail Bld # 1 Roof Replacement	\$80,000	2023-24	High	Port	Commercial facility upgrade
9	Boardwalk Repair	Repair / restore piling; secure slope	\$200,000	2023-24	High	HMGP / Port	Marina facility upgrade / public amenities
10	Basin 2 Docks / Transient Dock	Replace old docks P Dock and reconfigure spaces to accommodate larger vessels	\$600,000	2023-24	High	HMGP / Port	Commercial / Marina facility upgrade
11	Retail Bld # 2 Roof Replacement	Retail Bld # 2 Roof Replacement	\$80,000	2024-25	High	Port	Commercial facility upgrade
12	Basin 2 Docks	Replace old docks O Dock and reconfigure spaces to accommodate larger vessels	\$600,000	2024-25	High	HMGP / Port	Commercial / Marina facility upgrade
13	Travel Lift Ramp Replacement	Rebuild travel lift ramp	\$750,000	2025-26	Medium	HMGP / Port	Commercial / Marina facility upgrade
14	Basin 1 Slope Repairs	Basin1 slope repairs	\$600,000	2025-26	Medium	HMGP / Port	Marina facility upgrade
15	Basin 2 Docks	Replace old docks N Dock	\$600,000	2025-26	Medium	HMGP / Port	Commercial / Marina facility upgrade
16	Transient Dock / Barge-Icehouse / Basin 2 Slopes	Transient dock and barge/icehouse slope repairs	\$500,000	2025-26	Low	HMGP / Port	Marina facility upgrade
17	RV Park Facility Improvements	Upgrade back-in site utilities and improvements	\$700,000	2025-26	Low	Port	Recreation Improvements / public amenities
18	Receiving Docks - Hallmark	Demolish existing timber docks and concrete bulkhead; construct new concrete docks.	\$1,500,000	2025-26	Low	NHMP / Port	Commercial facility upgrade
19	Receiving Docks - Broken	Demolish existing timber docks and concrete bulkhead; construct new concrete docks.	\$1,500,000	2025-26	Low	HMGP / Port	Commercial facility upgrade
20	Receiving Docks - Pacific Seafood Old	Demolish existing timber docks and concrete bulkhead; construct new concrete docks.	\$750,000	2025-26	Low	HMGP / Port	Commercial facility upgrade
21	Basin 2 Stormwater and Paving - East Parking Area	Stormwater and paving improvements	\$250,000	2025-26	Low	Port - Grants	Commercial facility upgrade / public amenities
22	Green Building Area	Develop site for covered storage units for all types of equipment, gear, vessels, vehicles, etc.	\$1,000,000	2030-31	Low	Port - Grants	Commercial facility upgrade
23	RV Park Protection Wall	Install protective seawall	\$500,000	2030-31	Low	HMGP / Port	Recreation Improvements / public amenities
24	Basin 2 Docks	Replace old docks from C thru H	\$1,500,000	2030-31	Low	Port - Grants	Commercial / Marina facility upgrade
25	Commercial Center Upgrade	Commercial building and site repairs or building third retail building	\$1,500,000	2030-31	Low	Port - Grants	Commercial facility upgrade / public amenities
26	Development Potential of Port Bare Ground	Examine opportunity site for potential development - hotel / condo / business center	\$1,000,000	2030-31	Low	Port - Grants	Public-private partnership opportunity

Cost estimates are based on similar projects in other locations and are not based on detailed engineering plans or analysis. Final engineering and construction costs may vary.

Estimate Total \$22,942,000

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## 6. MANAGEMENT REPORTS

### A. June 2022 Safety & Security Report - Audio time 0:19:12

King reported on staff safety training, incidents, accidents, security issues that happened for the month of June and upcoming events happening at the Port.

### B. June 2022 Harbormaster Report - Audio time 0:21:10

Webster reported on projects that were completed in the month of June in the RV Park, marina, and equipment services. There was a discussion among the Board and staff regarding

### C. June 2022 Financial & Manager Report - Audio time 0:24:18

Dehlinger reported on the financials for the month of June. Dehlinger reviewed the Port items that happened in the month of June. There was a discussion among the Board and Staff regarding 1200Z permit. Jack Akin gave an update to the Board regarding the wastewater treatment plant, there was a discussion and questions from the Board.

**A motion was made by Speir and seconded by Hartung to approve the safety, security and environmental report, the harbormaster report, and the financial and manager report of June 2002 as discussed. The motion passed 5 – 0.**

## 7. ACTION ITEMS

### A. Boat Yard Building Plan – Audio time 0:45:52

Dehlinger reviewed with the Board what was discussed in the last meeting and what the Board had requested. Dehlinger stated that it is hard to get an accurate quote since the Board hasn't decided what kind of building we want. Dehlinger suggested to slow down to figure out what kind of building we want, ask an engineer to develop the drawings, then look for quotes, and ask for funding or seek out grants. Board allowed public comment. Range stated there is a third option and any building can be remodeled and would like to spend the money for an engineer to evaluate this structure as to what it would take to bring it in line aesthetically, structurally, and cosmetics of the exterior. Board discussion continued regarding the engineering report that was received by Jack Akin and his recommendations on proceeding forward with that building. Heap reviewed what the report had stated from what he remembers that the building needs to be brought back to code, basically you will be building a new building where the current one sits. Akin made it very clear to the Board that the structural engineer that created the report for the Port was not an associate of his at any time and this was the first time working with this person. His recommendations were not to demolish the building, his recommendations were if you wanted to keep the building that you have to make sure you are covering the Port for the safety infractions out there, it's a dangerous building. The building is failing at key stress points, you will spend a good deal of money trying to restore it, you will have to remove some material, and redo some construction errors made just to satisfy code.

**A motion was made by Range and seconded by Jonas to hire a structural engineer to look at our existing building and give us a cost, rough cost, what it would cost to structurally make it a viable building that meets code. The motion passed 3 – 2. Yes: Jonas, Range & Heap. No: Hartung & Speir.**

### B. Zola's on the Water Lease Amendment No. 2 – Audio time 1:16:53

Dehlinger reviewed the timeline and the actions from Zola's as to why the lease amendment is up for Board approval.

**A motion was made by Speir and seconded by Jonas to approve Zola's on the Water Commercial Lease Amendment No. 2. The motion passed 5 – 0.**

## 8. INFORMATION ITEMS

### A. Curry County Storm Drain Master Plan Draft April 2022 Review – Curry County Commissioners and Port Commissioners Meeting Date – Audio time 1:19:56

## ACTION ITEM – A

---

**DATE:** July 20, 2022  
**RE:** Boat Yard Building Plan  
**TO:** Honorable Board President and Harbor District Board Members  
**ISSUED BY:** Gary Dehlinger, Port Manager

---

### OVERVIEW

- May 18, 2022 meeting, the board approved seeking possible funding and to develop replacement proposal for the warehouse for board review.
- June 15, 2022 meeting, the board reviewed the initial replacement proposal with estimated cost to install the new buildings. During this review, suggestions were made to provide more information on estimated costs, review all port debt, and list of future projects that may require loans or other additional funding.
- Business Oregon provided the Port with a General Application for a loan up to \$1.2 million. Deadline to submit the application is August 3, 2022.
- Port staff contacted contractors, prefabricated metal building manufacture and vendors to provide a turnkey cost estimate. What we have found out, trying to get more detailed pricing requires complete construction drawings.
- Staff recommends deciding on the type, size and function of the building(s). Then acquire a designer/engineer to produce the design drawings for bidding purposes or future grant opportunities.
- Staff has provided two options for the boat yard. We are open to other suggestions. Both options allow for the new building to be built without displacing current tenants.
  - Option 1 is one large building that will require fire sprinkler system due to the size of the building. Buildings larger than 5,000 square feet require fire sprinkler system.
  - Option 2 is two buildings that may require fire sprinkler system due to type of businesses inside the spaces.
- Proposed administrative schedule to develop the construction drawings:
  1. Board to decide of type, size, and function of the buildings.
  2. Request for proposal (RFP) for designer or engineering company to develop construction drawings for the approval on design/building(s) concept.
  3. Decide to search for grants or place project out to bid.
  4. Develop grant documents or bidding package.
- Development of the construction drawings would be funded by Port General Fund. Estimated cost at \$50,000 and could take 6 months to complete.
- Attached is a summary of Port debt as of July 2022 with future projects that may need loan type of funding.

## DOCUMENTS

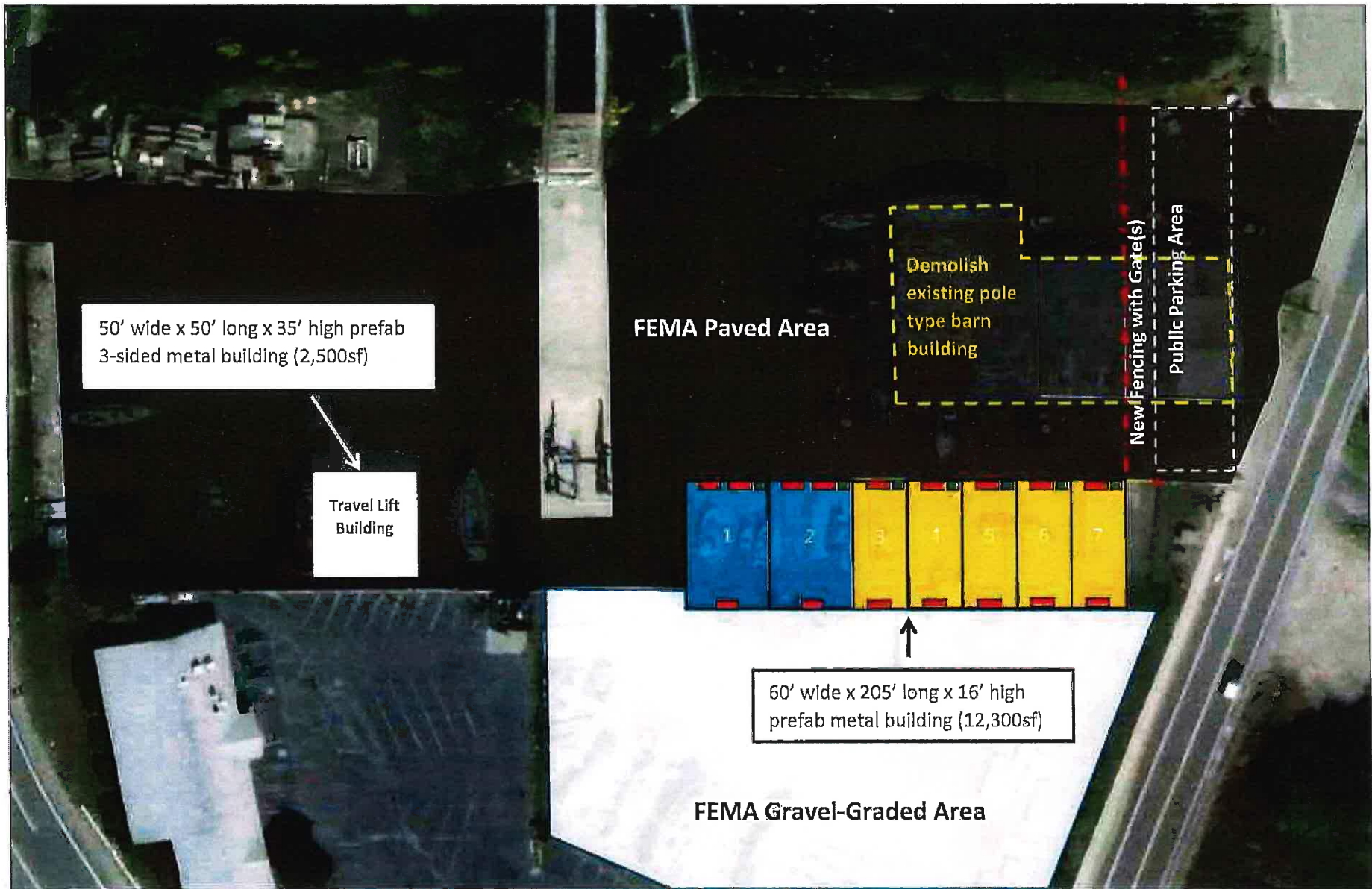
- Proposed Boat Yard Building(s), 2 pages
- Summary of Port Debt, as of July 2022 with Future Port Projects, 1 page

## COMMISSIONERS ACTION

- **Recommended Motion:**  
Motion to approve the Port Manager to seek proposals for a designer/engineer company to prepare construction drawings for the new boat yard buildings. Postpone Business Oregon General Application Loan until further notice.



# Proposed New Boat Yard Warehouse Building Layout – Option 1



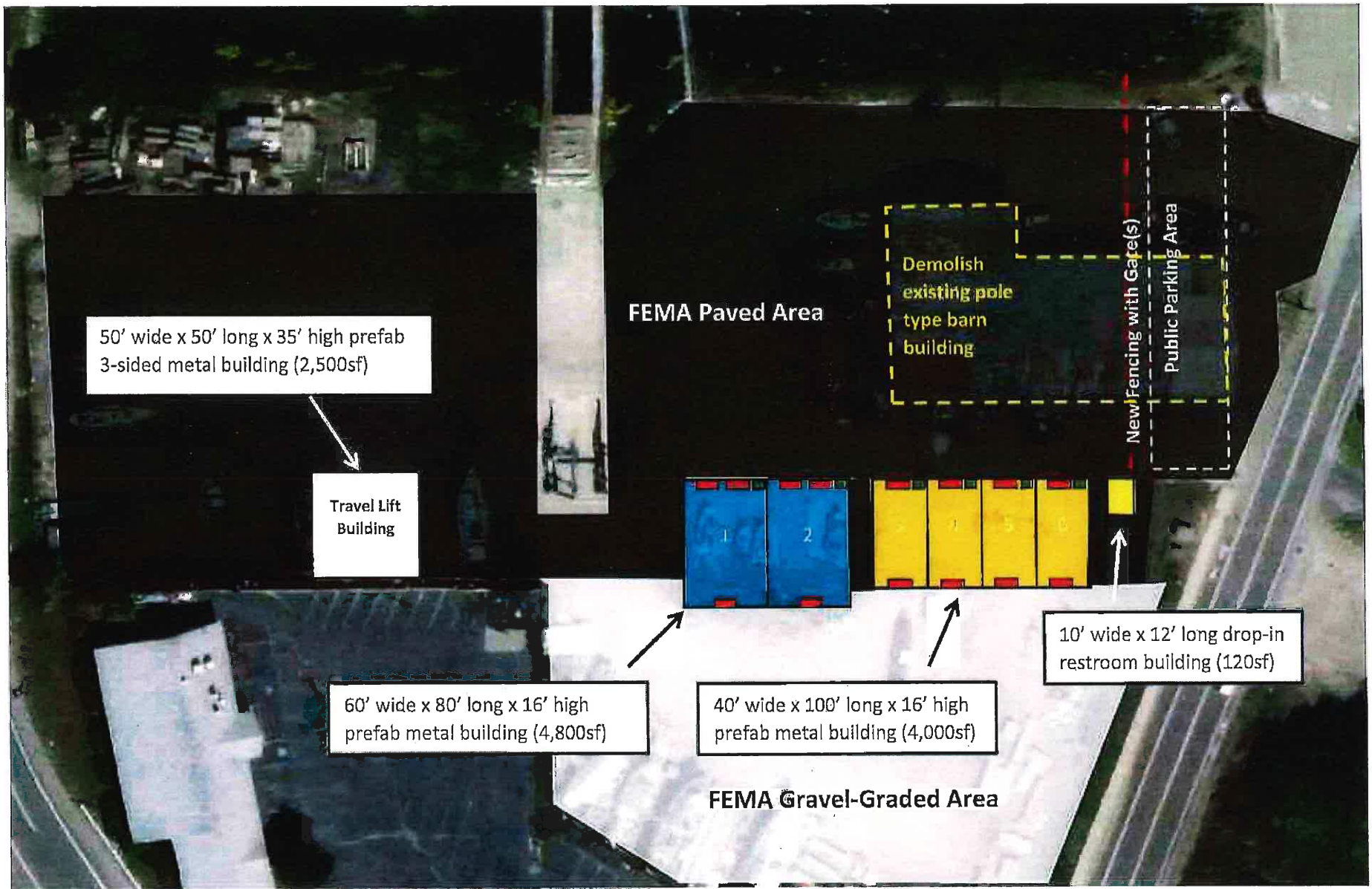
12' wide x 14' high roll-up door

Walk-in Door

Spaces 1 & 2 = 40ft x 60ft Spaces 3 – 6 = 25ft x 60ft

Space 7 would include Restroom (200sf)

# Proposed New Boat Yard Warehouse Building Layout – Option 2



12' wide x 14' high roll-up door

Walk-in Door

Spaces 1 & 2 = 40ft x 60ft

Spaces 3 – 6 = 25ft x 40ft

## Port Debt as of July 2022

### Business Oregon - IFA Debt

Description	Principal Balance	Interest Balance	Balance	Monthly Payment	Maturity Date
1 L98004/Basin 2 Dock Improvement	-	312,338.92	312,338.92		March - 2030
2 X03004/Eureka Fishery-Property Improvement	141,390.35	197,881.55	339,271.90		March - 2030
3 520139/Boardwalk	15,173.71	175,540.26	190,713.97		March - 2030
4 525172/RV Park Improvement	82,102.00	138,594.25	220,696.25		March - 2030
5 525176/Green Bldg	210,843.50	263,665.71	474,509.21		March - 2030
6 525181/Eureka Fishery-Property Purchase	140,867.04	347,562.39	488,429.43		March - 2030
7 L02001/Marine Fueling Dock	-	240,371.49	240,371.49		March - 2030
8 L02009/Cold Storage	419,299.07	1,025,118.15	1,444,417.22		March - 2030
				25,833.33	
Total Accrued Interest (Frozen)	1,009,675.67	3,148,768.01			March - 2030

### USDA Revenue Bond

Description	Balance	Monthly Payment	Maturity Date
1 Basin 1 Renovation	924,602.54	10,844.16	November - 2030

### Umpqua Bank

Description	Balance	Monthly Payment	Maturity Date
1 RV Park Restroom & Improvement	626,711.96	4,809.87	July - 2035
2 2018 Genie Forklift	43,165.32	1,464.71	February - 2025

### M2 Lease

Description	Balance	Monthly Payment	Maturity Date
1 50 BFMII Travel Lift	71,684.44	4,659.00	November - 2023

Current - Total Monthly Payment 47,611.07

**Total Debt 5,824,607.94 as of July 2022**

### Future Projects Possible Loans

Description	Estimated Loan Amount	Monthly Payment at 5% APR
1 Boat Yard Warehouse & Buildings	1,200,000.00	6,334.04
2 Wastewater Treatment Plant - Matching	700,000.00	4,092.13
3 RV Park Expansion - Utilities & Amenities	750,000.00	4,384.43
4 Travel Lift Ramp	1,000,000.00	5,845.90
5 Receiving Dock Replacements	3,000,000.00	17,537.70
6 Boardwalk & Slope Repairs	500,000.00	2,922.95
7 RV Park Backrow Site Upgrades	750,000.00	4,384.43
8 Dock Renovations	4,000,000.00	23,383.60
9 All Basin Slope and Shoring Repairs	2,000,000.00	11,691.80
10 RV Park Drainage and Paving	750,000.00	4,384.43
11 Storage Buildings	2,000,000.00	11,691.80
12 Third Retail Building	1,500,000.00	8,768.85
13 Culvert Replacements	1,000,000.00	5,845.90
14 RV Park Protection Wall	750,000.00	4,384.43
15 New Boat Wash Station	250,000.00	1,461.48
16 Public Amenities	300,000.00	1,753.77
17 Dock Power Repairs / Replacement	1,500,000.00	8,768.85

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## ACTION ITEM – C

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**DATE:** August 17, 2022

**RE:** Boat Yard Warehouse Structural Analysis and Report Approval for Expense

**TO:** Honorable Board President and Harbor District Board Members

**ISSUED BY:**

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### OVERVIEW

- May 18, 2022 meeting, the board approved seeking funding for a new building and provide proposals for the warehouse for board review.
- June 15, 2022 meeting, the board reviewed the initial replacement proposal with estimated cost to install the new building(s). During this review, suggestions were made to provide more information on estimated costs, review all port debt, and list of future projects that may require loans or other additional funding.
- July 20, 2022 meeting, the board approved seeking a second structural analysis and what it would take to bring the existing building up to code.
- The Business Oregon loan application expired. If the Port wants to apply for a loan again, the process will need to start over.
- Port contacted (9) nine structural engineering or architect firms seeking the analysis of the warehouse as the board requested.
- Does the board have any other firms they have in mind or select from the firms that did respond? What are the parameters of the contract?

### DOCUMENTS

- Emails from structural engineers and architects, 10 pages

### COMMISSIONERS ACTION

- **Recommended Motion:**

**portmanager@portofbrookingsharbor.com**

---

**From:** Dave Morris <davemorris@mcgee-engineering.com>  
**Sent:** Friday, August 5, 2022 10:17 AM  
**To:** portmanager@portofbrookingsharbor.com  
**Cc:** Alex Dunn; Thompson, Don; Chad Franklin  
**Subject:** RE: Port of Brookings-Harbor Shop Building Review  
**Attachments:** McGee Proposal Port of B-H Shop review.pdf

Gary:

Please find attached our proposal for the review of the existing Shop Building at the Port of Brookings-Harbor.

We have included two other firms on our team. West Coast Contractors out of Coos Bay ([www.westcoastcontractors.com](http://www.westcoastcontractors.com)) has extensive experience in the construction of all types of facilities up and down the coast specifically including structural work for port facilities. They will be consulting on the overall approach and doing the cost estimates other than electrical. We recently worked with West Coast on the emergency replacement of the dock mounted ice production facility for the Port of Charleston. Reese Electric out of North Bend ([www.resseelectric.com](http://www.resseelectric.com)) was the electrical contractor for that job. They also have decades of experience working on the coast on all kinds of projects. Reese Electric will be providing the electrical review and cost estimate.

We have included an option in our proposal for you to end the study early if the initial investigation shows that there is no practical way to renovate the structure. If you chose this option we would provide a letter explaining the issues that make the renovation difficult or impossible. This would allow you to avoid the cost of the full study if it becomes clear that the structure cannot be renovated to current code.

Thank you for the opportunity to provide this proposal. Please call or email if you have any questions. I am in today. I will be out of the office next week. Monday, I will be available by email. If you have questions the rest of the week please contact Alex Dunn at our office.

Dave Morris, S.E.  
Structural Engineer



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Cell [\(541\) 760-8270](tel:(541)760-8270)  
Direct [\(541\) 241-9574](tel:(541)241-9574)  
Fax [\(541\) 758-6585](tel:(541)758-6585)  
[www.mcgee-engineering.com](http://www.mcgee-engineering.com)

**Address:** 804 D NW Buchanan Ave. Corvallis, OR 97330  
**Mailing:** P.O. Box 1067 Corvallis, OR 97339



**Dave Morris, P.E., S.E. Senior Structural Engineer**

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Direct: (541) 241-9574  
davemorris@mcgee-engineering.com

804 D NW Buchanan Ave. Corvallis, OR 97330  
P.O. Box 1067 Corvallis, OR 97339  
www.mcgee-engineering.com

August 5, 2022

Port of Brookings-Harbor  
16330 Lower Harbor Road  
Brookings, Oregon 97415

**ATTN:** Gary Dehlinger  
Port Manager

**RE:** Proposal for Engineering Services  
Review of Existing Shop Building  
Port of Brookings-Harbor

Gary,

Thank you for the opportunity to provide this proposal for engineering services for the evaluation of the existing shop building at the Port. We have assembled a team to assist us with this project. West Coast Contractors will be providing assistance with overall construction strategy and cost estimating. Reese Electric will be handling the electrical review and cost estimate.

#### **DESCRIPTION OF PROJECT:**

The port owns an existing 11,500 square foot wood framed building in the harbor area. As we understand it the building has been its current location for 50 years when it was moved there from another site. Based on our previous correspondence we understand that the goal of this review is to determine what it would take to upgrade this building to meet current building code requirements and current electrical code requirements and how much these upgrades will cost.

#### **SCOPE OF SERVICES:**

- 1) Site Visit – McGee, WCC and Reese will make site visits to document the building construction and condition. We would also want to meet with someone on site who is familiar with the building and could talk about any known problems that should be considered in the review.
- 2) Building Analysis – McGee will do the structural review of the existing structure to identify what areas do not comply with current code requirements.
- 3) Electrical Review – Reese will do the review of the electrical systems and identify items that need to be improved or replaced.



- 4) Cost Estimate – McGee will prepare a site plan, a floor plan and two building sections. These drawings will show the proposed structural improvements. These will not be "construction ready" drawings. They are intended only to show the primary work elements. Based on these drawings and their site visit WCC will prepare an opinion of probable cost for the building construction. Reese will prepare a list of work items along with an opinion of probable cost for the remedial electrical work. We are not proposing to provide electrical drawings.
- 5) Report – McGee will provide a final report summarizing our observations, conclusions, recommendations, and an overall opinion of probable cost.

You had indicated that there may be some site work required. One item mentioned was a sump pump. We will plan to review that system or plan for an alternate. At this point we were not planning to include any work outside the building such as site grading, parking lot layout, site ADA improvements, surveying, signing, striping, or sidewalks.

We were also not planning to include a geotechnical investigation of the site. That would provide useful information but would be a substantial additional cost for this level of review. We can add that work and its associated cost if you like. Without the Geotech report we will be making our foundation recommendations based on information we can gather from other sources. We understand that the port does not have any Geotechnical Reports for other work done around the port facility or records of excavations done in this area. We further understand that the Port does not have any existing drawings of the building or of past work done on the buildings.

#### **ESTIMATED COST OF SERVICES:**

TOTAL DESIGN FEES:	\$ 29,000
<u>TOTAL REIMBURSABLE EXPENSES:</u>	<u>\$ 500</u>
TOTAL FEES:	\$ 29,500

If, after the site visits, the team, in consultation with the Port, determines that there is clearly no feasible path to retrofit this building to meet current code requirements we would terminate the study at this point and provide a letter summarizing the reasons for our opinion. We would bill \$5000 for the site visits and hourly for other work after the site visits as required to prepare the summary letter, answer questions, on-line meetings and other coordination to provide the summary letter. Our hourly rates are attached. Time for West Coast Contractors and Reese Electric will be billed at \$115 per hour. If we stop here we would not provide a retrofit strategy or cost estimates. Our estimate is that fees at this point would not exceed \$10,000.

This proposal is an estimation of the work items included in this project. If in the event different items arise that are outside the scope of this contract, including meetings or revisions, they will be billed on a time and materials basis. Reimbursable expenses may include costs associated with (but not limited to) the following: printing, copies, postage, and mileage.

Thank you for the opportunity to provide a proposal for this work. Feel free to call or email with any questions.

**TERMS OF ACCEPTANCE OF PROPOSAL.**

Signing this proposal constitutes an acceptance of its terms including all prices and costs. It must be returned to McGee Engineering, Inc. prior to start of work.

Authorized Signature:   
Alex Dunn, P.E.

Date: 8/4/22

Authorized Signature: \_\_\_\_\_

Date: \_\_\_\_\_

ATTACHED: 2022 Rate Sheet



## **SUMMARY OF BILLING RATES AND METHODS**

Office: (541) 757-1270  
Fax: (541) 758-6585  
alexduinn@mcgee-engineering.com

804 D NW Buchanan Ave. Corvallis, OR 97330  
P.O. Box 1067 Corvallis, OR 97339  
www.mcgee-engineering.com

**Effective January 1, 2022**

McGee Engineering, Inc, an Oregon corporation, registered in all counties in the State of Oregon.

### **Hourly Rates:**

Engineer Grade VIII .....\$177 per hour  
Engineer Grade VI .....\$147 per hour  
Engineer Grade V .....\$134 per hour  
Engineer Grade IV .....\$122 per hour  
Engineer Grade III .....\$90 per hour  
Engineer Grade II .....\$82 per hour  
Technician Grade B .....\$82 per hour  
Clerical .....\$61 per hour  
No overtime fees added to professional fees

### **Travel**

Automobile mileage is charged at the current federal rate. Mileage is charged from Corvallis. Plane fares and lodging are billed as project expenses.

**Project Direct Expenses** include, but are not limited to, the following invoiced costs:

Testing Fees, Freight, Plane Fares, Lodging Costs, and Parking Fees

**Overhead Expenses** are included in professional fees and are not charged separately. These overhead expenses include:

Professional and Commercial Insurance, Office Rent and Utilities, Telephone/fax expenses,  
Computer/software costs, Stationery supplies, Office related clerical, and copying costs

### **Insurance Coverage:**

BROKER: Orion Insurance Group, Bothell, WA (425)771-5197, Christopher Day  
Professional Insurance - \$2,000,000 aggregate (Admiral)  
Commercial General Liability - \$2,000,000 (Travelers)  
Automobile Insurance - \$1,000,000 umbrella (Travelers)  
Workers' Compensation (SAIF)

**Professional Engineer Registrations** are held in the states of Oregon, Washington, California, Alaska, Idaho, and South Dakota.

TB



**portmanager@portofbrookingsharbor.com**

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**From:** J Burns <jburns@dyerpart.com>  
**Sent:** Thursday, July 21, 2022 9:19 AM  
**To:** portmanager@portofbrookingsharbor.com  
**Subject:** RE: Port of Brookings Harbor - Structure Analysis

Good Morning Gary,

Thank you for the request. Unfortunately, you will need an architect for this project. Maybe Gene Bolante with Studio 3 Architecture (503) 390-6500. Hope that helps.

Cordially,

*Mrs. Joey Burns*  
The Dyer Partnership Engineers & Planners, Inc.  
1330 Teakwood Avenue  
Coos Bay, OR 97420  
(541) 269-0732 Fax: (541) 269-2044  
[jburns@dyerpart.com](mailto:jburns@dyerpart.com)

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**From:** portmanager@portofbrookingsharbor.com <portmanager@portofbrookingsharbor.com>  
**Sent:** Thursday, July 21, 2022 6:37 AM  
**To:** Info <info@dyerpart.com>  
**Subject:** Port of Brookings Harbor - Structure Analysis

Hello,

The Port of Brookings Harbor, Board of Commissioners, have requested to get a structural analysis of our existing warehouse building and to bring it up to code, i.e., structural, electrical and possibly civil. Our existing building is well over 50 years old and has issues. The commissioners would like a total repair estimate of what it would cost to get it to today's standards. Could your company prepare this analysis and report and what would your estimated costs be for this analysis and report?

Thank you,

Gary Dehlinger  
Port of Brookings Harbor  
Cell 541-254-4162

**portmanager@portofbrookingsharbor.com**

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**From:** Lance Martz <mt2@structure1.com>  
**Sent:** Wednesday, July 20, 2022 4:46 PM  
**To:** portmanager@portofbrookingsharbor.com  
**Subject:** RE: An Online Quote has been Submitted

Gary,

We are short-staffed and unable to do site inspections at this time.  
This inspection would take approximately 8 hours round trip plus site time.

It is too far for us to be able to be competitive with for cost, as well as not having the manpower to service your request.

We are sorry, but we have to decline this opportunity.

***Thank you!***

**Lance Martz**  
**Business Development Manager**

**PSE CONSULTING ENGINEERS, INC.**

250 Main St., Ste. A  
Klamath Falls, OR 97601  
Ph: 541-850-6300

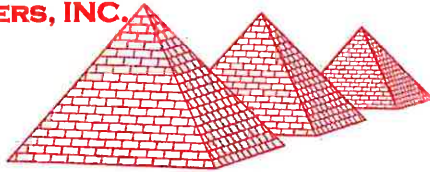
Email: [mt2@structure1.com](mailto:mt2@structure1.com)

Website: [www.structure1.com](http://www.structure1.com)

**Disclaimers:**

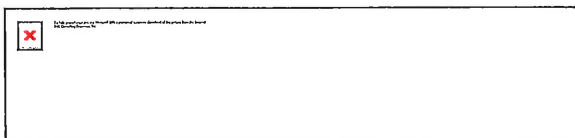
The information in this email and any attachments or links may contain proprietary and confidential information that is intended for the addressee(s) only. If you are not the intended recipient, you are hereby notified that any disclosure, copying, distribution, retention or use of the contents of this information is prohibited. When addressed to our clients or vendors, any information contained in this e-mail or any attachments is subject to the terms and conditions in any governing contract. If you have received this e-mail in error, please immediately contact the sender and delete the e-mail. Thank you.

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**From:** Gary Dehlinger <wordpress@www.structure1.com>  
**Sent:** Wednesday, July 20, 2022 4:41 PM  
**To:** Lance Martz <mt2@structure1.com>; MT1 <mt1@structure1.com>; webmaster226@hotmail.com; Natalie Hernandez <mt3@structure1.com>  
**Subject:** An Online Quote has been Submitted



**portmanager@portofbrookingsharbor.com**

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**From:** brian@deiengineers.com  
**Sent:** Thursday, July 21, 2022 10:13 AM  
**To:** portmanager@portofbrookingsharbor.com  
**Subject:** RE: Port of Brookings Harbor

Gary,

You would be best to tear it down and build a new metal building on a new foundation.

I can tell you that just by looking at the pictures.

Best Regards,

Brian



Brian Dunagan, PE | *Principal Engineer*  
**Ashland:** 541.897.0021 | **Reno:** 775.329.2733 | **Cell:** 775.742.4200  
**DEIengineers.com**

DEI Engineers southern Oregon office has moved to 106 South Market Street #2, Talent, OR 97540. Our mailing address is PO Box 796, Talent, OR 97540.

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**From:** portmanager@portofbrookingsharbor.com <portmanager@portofbrookingsharbor.com>  
**Sent:** Thursday, July 21, 2022 9:13 AM  
**To:** brian@deiengineers.com  
**Subject:** RE: Port of Brookings Harbor

Hi Brian,

My responses to your questions are below and attached some photos of the existing building. The building is approximately 11,500 sf.

Do you have any existing drawings so we could see what you have?

**We do not have any drawings. This building was relocated to Port property over 50 years ago from a local farm, I was told. Actual age is unknown.**

Is the report for you or a specific entity?

**The report is for the Port of Brookings Harbor a public entity.**

Do you have a format or specific type of report that has been requested?

**No format requested, basically the board of commissioners would like to see a report on what it would take and cost to bring this building to code.**

What is your timing?



Time is of the essence, but I need to get board approval for the expense, which may be approved in August. They will need to see your hourly rates and some sort of an estimated total cost or not to exceed amount. I am contacting other engineering firms for pricing and availability for the board to make a decision.



**Gary Dehlinger**  
*Port Manager*  
16330 Lower Harbor Road  
Brookings, Oregon 97415  
Office: (541) 541-2218, Ext 406  
Cell: (541) 254-4162

From: [brian@deiengineers.com](mailto:brian@deiengineers.com) <[brian@deiengineers.com](mailto:brian@deiengineers.com)>  
Sent: Thursday, July 21, 2022 8:32 AM  
To: [portmanager@portofbrookingsharbor.com](mailto:portmanager@portofbrookingsharbor.com)  
Subject: Port of Brookings Harbor

Mr. Dehlinger,

We could provide this?

Do you have any existing drawings so we could see what you have?

Is the report for you or a specific entity?

Do you have a format or specific type of report that has been requested?

What is your timing?

For something like this we would bill you hourly including travel time and mileage. We could provide an estimate but this will depend on the detail you want in the report.

Best Regards,

Brian

**DEI**  
*engineers*

Brian Dunagan, PE | *Principal Engineer*  
Ashland: 541.897.0021 | Reno: 775.329.2733 | Cell: 775.742.4200  
[DEIengineers.com](http://DEIengineers.com)

DEI Engineers southern Oregon office has moved to 106 South Market Street #2, Talent, OR 97540. Our mailing address is PO Box 796, Talent, OR 97540.

**portmanager@portofbrookingsharbor.com**

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**From:** dduru@galligroup.com  
**Sent:** Thursday, July 21, 2022 10:20 AM  
**To:** portmanager@portofbrookingsharbor.com  
**Cc:** stephenc@zcsea.com; admin  
**Subject:** Re: New submission from Contact Form

Gary,

Thank you for inquiring with us on this project. As I mentioned in our phone conversation, we are a geotechnical firm and deal mostly with geological and geotechnical components of projects. However, we have worked with ZCS on numerous retrofit projects in southern Oregon and along the Oregon coast. These projects include retrofit of existing elementary and high schools, fire stations and other emergency services buildings, bringing them up to code. Below is the information for Stephen Chase (also copied on this email), one of ZCS lead designers we have worked with on most of these projects. We highly recommend them for your project.

ZCS Contact;  
Stephen Chase  
Lead Designer  
ZCS Engineering & Architecture  
Office | 541.479.3865  
127 NW D Street, Grants Pass, OR 97526

Please let me know if you need anything from the Galli Group as we enjoyed working with you in the past.

Best regards,

Dennis Duru, M.Sc., P.E., R.G., C.E.G.  
Engineering Manager

The Galli Group  
612 NW 3rd Street  
Grants Pass, OR 97526  
P: (541) 955-1611  
C: (541) 840-6046  
F: (541) 955-8150

Quoting admin@galligroup.com:

> From: Gary Dehlinger <portmanager@portofbrookingsharbor.com>  
> Sent: Thursday, July 21, 2022 6:43 AM  
> To: admin@galligroup.com  
> Subject: New submission from Contact Form  
>  
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