



Agenda Item No. (3)

To: Building and Operating Committee/Committee of the Whole
Meeting of December 15, 2016

From: Jennifer Raupach, Principal Analyst, Capital & Grant Programs
Amy Frye, Director, Capital & Grant Programs
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Subject: **APPROVE ACTIONS RELATIVE TO A REVISED FUNDING PLAN FOR
THE GOLDEN GATE BRIDGE PHYSICAL SUICIDE DETERRENT
SYSTEM AND WIND RETROFIT PROJECT**

Recommendation

The Building and Operating Committee recommends that the Board of Directors approve actions relative to a revised funding plan for the Golden Gate Bridge Physical Suicide Deterrent System and Wind Retrofit Project as follows:

- 1) Authorize the programming of an additional \$40,330,314 in District reserves to the Golden Gate Bridge Physical Suicide Deterrent System (Project #1526). Approval of this action, in combination with additional funding secured from Caltrans and the Metropolitan Transportation Commission (MTC), will fully fund the project and allow the District to proceed with the construction phase.
- 2) Authorize a capital budget increase to the Golden Gate Bridge Physical Suicide Deterrent System (SDS) Project (Project #1526), in the amount of \$116,495,314 for a total project budget of \$192,335,000. The project will be funded with \$67,000,000 of federal Surface Transportation Program (STP) funds programmed by MTC, \$58,140,000 of federal Highway Bridge Program (HBP) funds programmed by Caltrans, \$7,000,000 of California Mental Health Service Act Funds (Proposition 63), \$194,868 in Cell Site revenues, \$25,000 from the Aster Family Fund of the Marin Community Foundation (MCF) and \$59,975,132 from District reserves.
- 3) Authorize a capital budget increase to the Golden Gate Bridge Seismic Retrofit, Wind Retrofit (WR) Project (Project #1528), in the amount of \$3,860,000, for a total project budget of \$11,860,000. The project will be funded entirely with federal Local Highway Bridge (HBP) funds programmed by Caltrans.

Background

The District is committed to saving lives. In 2015, 186 people came to the Bridge to end their lives. Of those, 153 were stopped and taken off of the Bridge for a psychiatric hold at a local hospital. The District has staff dedicated to patrolling the sidewalks to intervene and save lives, and they are responsible for the vast majority of these 153 people being alive today. While 153 people were saved last year, 33 others sadly died. In order to end this loss, the District has been working toward constructing a physical suicide barrier on the Golden Gate Bridge.

This project will construct a net to deter suicides and save lives. The net will be located twenty feet below the sidewalk and extend out about twenty feet. It will be made from marine-grade, stainless steel wire rope supported by steel struts that are painted the Bridge's signature color. Nets have been proven as effective suicide deterrents on bridges during the past two decades at more than a dozen locations around the world. During this time only one person has died at these net installations. The net is designed to minimize and avoid visual impacts from and of the Bridge. It will not be visible to motorists driving on the Bridge.

The Board of Directors adopted Resolution No. 2014-066 at its meeting of June 27, 2014, wherein the Board outlined the compelling reasons for spending toll funds for the construction of this project. A copy of the Resolution is attached.

Physical Suicide Deterrent System Project

On June 27, 2014, the Board of Directors approved a \$76,000,000 funding plan for the construction of the Golden Gate Bridge Physical Suicide Deterrent System (SDS) Project (Project). Several significant commitments from external funding agencies and the District were secured to fully fund the Project, which ultimately allowed the District to proceed with construction.

- 1) The District worked closely with MTC in developing a funding plan for the construction of the Project. On July 23, 2014, MTC approved programming for \$27 million of federal STP funds for the Project.
- 2) The District also worked closely with Caltrans and the Federal Highway Administration (FHWA) to obtain federal HBP funds for the Project. Caltrans committed to program \$22 million of these monies to the Project.
- 3) Additionally, the District pursued other, nontraditional funding sources. On June 15, 2014, the California state legislature passed the Budget Bill (Senate Bill 852) that provides for \$7 million from the Mental Health Services Fund (Proposition 63) for the construction of the Project, which was approved by the Mental Health Services Oversight and Accountability Commission (MHSOAC) on July 24, 2014.
- 4) Considering the funding outlined above, approximately 74 percent of the total cost of the Project was provided by state and federal sources. As a condition to receive these funds, on June 27, 2014, the Board approved an allocation of \$20 million from District Reserves to secure the requisite local funding match. With this action, the SDS Project was fully funded at \$76,000,000 to allow the District to proceed to construction.

Over the next year and a half, two additional budget adjustments were approved by the Board on the Project. The first adjustment transferred \$355,182 in District funds from the SDS construction phase to complete the SDS design phase (Board action: 8/21/15). The second adjustment increased the budget by \$194,868 due to the receipt of cell sites revenues from the National Park Service (Board action: 10/8/15). With these two actions, the budget for the Project currently is \$75,839,686.

Table 1 below summarizes the budget adjustments for the Project prior to the bid opening.

Table 1: Budget Adjustments

<i>Sources of Funds</i>	<i>Original Budget Adopted 7/24/14</i>	<i>Budget Adjustments since 7/24/14</i>	<i>Most Recent Budget As of 10/8/15</i>
MTC-STP Funds	\$27,000,000		\$27,000,000
Caltrans HBP Funds	\$22,000,000		\$22,000,000
GGBHTD District	\$20,000,000	(\$355,182)	\$19,644,818
MHSOAC	\$7,000,000		\$7,000,000
Cell Site Revenues	\$0	\$194,868	\$194,868
TOTAL	\$76,000,000	(\$160,314)	\$75,839,686

Wind Retrofit Project

Construction of the Project will be combined with a separate though related project, the Wind Retrofit Project. Wind tunnel testing and analysis determined that the Bridge should be retrofit for high wind events for the SDS Project. Originally scheduled as part of the final phase of the Golden Gate Bridge Seismic Retrofit Project, the construction of the WR Project was added to the SDS contract to avoid delays. The Wind Retrofit Project has been separately environmentally cleared and designed. The original project budget of \$8 million is funded with available federal HBP funds set aside for the Seismic Retrofit project.

Bid Advertisement and Additional Funding

On October 13, 2015, the District released the advertisement for the construction of the SDS and WR Projects. Contract No. 2016-B-1 included construction of a horizontal stainless steel net supported by the cantilevered steel brackets along the west and east sides of four Golden Gate Bridge structures: the South Approach Viaduct, the Fort Point Arch, the Suspension Bridge, and the North Approach Viaduct; construction of a tall vertical railing at the North Anchorage Housing; replacement of the Suspension Bridge maintenance travelers with new travelers; and construction of the Suspension Bridge Wind Retrofit along the west side of the Main Span.

The District opened bids for the SDS and WR Projects on July 12, 2016. The District received two bids, both of which significantly exceeded the \$84 million (\$76M SDS + \$8M WR) construction budget for the project.

1. Shimmick Construction Company, Inc./Danny's Construction Company LLC, a Joint Venture. Oakland, CA. \$142,051,868
2. American Bridge Company. Coraopolis, PA. \$174,420,000

On September 23, 2016, the Board of Directors authorized staff to seek a 90-day extension on the bid validity period for the contract in order to allow for the development of a revised funding plan.

Since that time, District staff has worked closely with funding partners to identify additional funding. Caltrans and MTC have committed additional funding for the SDS and WR Projects, predicated on the District also contributing additional funds, as summarized in the following table.

Table 2: Additional Funding Identified for SDS and WR

<i>Agency</i>	<i>Proposed/Committed (for SDS and WR)</i>	<i>% Share</i>
MTC	\$40,000,000	33%
Caltrans	\$40,000,000	33%
GGBHTD	\$40,000,000*	33%
TOTAL	\$120,000,000	100%

*With the understanding that the District may use nontraditional funding sources for a portion of its \$40 million.

With approval of these three actions, the new total project budget for the SDS Project is \$192,335,000. For the WR project, the new total project budget is \$11,860,000. The two projects combined total \$204,195,000.

The revised funding plan for the SDS and WR projects is summarized in Table 3 on the following page.

Table 3: Revised Funding Plan

<i>Sources of Funds</i>	<i>Most Recent Budget As of 10/8/15</i>	<i>Recommended Budget Adjustment</i>	<i>Revised Budget</i>
Physical Suicide Deterrent System (SDS) Project			
MTC-STP Funds	\$27,000,000	\$40,000,000	\$67,000,000
Caltrans HBP Funds	\$22,000,000	\$36,140,000	\$58,140,000
GGBHTD District	\$19,644,818	\$40,330,314	\$59,975,132
MHSOAC	\$7,000,000	-	\$7,000,000
Cell Site Revenues	\$194,868	-	\$194,868
Aster Family Fund of MCF	-	\$25,000	\$25,000
SUBTOTAL SDS	\$75,839,686	\$116,495,314	\$192,335,000
Seismic Retrofit, Wind Retrofit (WR) Project			
Caltrans HBP Funds	\$8,000,000	\$3,860,000	\$11,860,000
TOTAL (SDS+WR)	\$83,839,686	\$120,355,314	\$204,195,000

Fiscal Impact

As mentioned above, staff recommends approval of \$39,975,000 million in District reserves. Additionally, an increase of \$355,314 is required to restore the District's original funding level for SDS construction in light of budget adjustment #1 in August 2015, which diverted SDS construction funds to the SDS design phase. With this, the total recommended increase from District reserves for the SDS Project is \$40,330,314. This brings the total District contribution to the project to \$59,975,132.

Attachment: Resolution No. 2014-066

GOLDEN GATE BRIDGE, HIGHWAY AND TRANSPORTATION DISTRICT

RESOLUTION 2014-066

**APPROVE FUNDING PLAN FOR CONSTRUCTION OF GOLDEN GATE BRIDGE
PHYSICAL SUICIDE DETERRENT SYSTEM PROJECT**

June 27, 2014

**THIS RESOLUTION IS ADOPTED WITH REFERENCE TO THE FOLLOWING
FACTS AND CIRCUMSTANCES, WHICH ARE FOUND AND DETERMINED BY THE
BOARD OF DIRECTORS:**

1. By Resolution 2005-015, adopted on March 11, 2005, the Board of Directors approved proceeding with environmental studies and preliminary design work for the development of a physical suicide deterrent system on the Golden Gate Bridge ("Project"). This action was taken after the Board reviewed the long history of the District's consideration of this highly challenging and controversial issue associated with suicides at the Golden Gate Bridge, considered extensive public testimony, and engaged in thoughtful deliberation. In taking this action, the Board considered the necessary steps and conditions for project development, including the development of design criteria, aerodynamic studies, alternative analyses, environmental analyses, and regulatory reviews. The Board took into account the difficulty, if not impossibility, of devising a suicide deterrent system that would make it physically impossible in all circumstances for suicides to occur. The Board authorized the President to constitute an advisory committee to work with staff to investigate and develop financial support from external public and private sources to finance the project. The estimated cost for the development of environmental studies and preliminary design work ("Studies") for a physical suicide deterrent system on the Golden Gate Bridge contemplated by Resolution 2005-015 was \$2 million.

2. By Resolution 2005-033, adopted on April 22, 2005, the Board of Directors approved adoption of new policy level criteria for use in the evaluation of alternatives for physical suicide deterrent systems ("Policy Criteria"). The new criteria specified eleven different elements, briefly summarized as follows: a potential physical suicide deterrent system must impede the ability of an individual to jump off the bridge; not cause safety or nuisance hazards to sidewalk users; be able to be maintained as part of routine bridge maintenance without undue risk of injury to District employees, not diminish the ability for adequate security of the Bridge; allow access to the underside of the Bridge for emergency response and maintenance activities; not have a negative impact on wind stability of the Bridge; satisfy state and federal historic preservation laws; have minimal visual and aesthetic impacts on the Bridge; be cost effective to construct and maintain; not create undue risk of injury to anyone who comes in contact with the suicide deterrent system; and not prevent construction of a moveable median barrier on the Bridge.

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3. In order to fund the Studies, the Board advisory committee and District staff sought funding from external sources, regional and local governmental entities, as well as private sources. As of March 2006, the Metropolitan Transportation Commission allocated \$1.6 million of federal funds for the Studies, to be matched by \$400,000 from local funding sources. Local funding in the amount of \$100,000 from the City and County of San Francisco, \$25,000 from the County of Marin, and \$18,600 from the Psychiatric Foundation of Northern California and other donors was raised. Based thereon, the Board of Directors adopted Resolution 2006-020 on March 10, 2006 to authorize proceeding with Phase One of the Studies, consisting of conceptual designs, and initial wind stability testing and analysis, with the understanding that no further work would be authorized until full funding from sources other than District funds were secured. District staff proceeded to prepare a Request for Proposals for the Studies. Full funding was secured as of June 2006 when the Metropolitan Transportation Commission approved a total of \$1,850,000 for the Studies.

4. As soon as full funding was secured, the District immediately issued a Request for Proposals to engineering, planning and architectural firms for this work. By Resolution 2006-077, adopted on September 22, 2006, the Board authorized the hiring of DMJM Harris, Inc. to prepare preliminary design, wind tunnel testing and environmental studies for a physical suicide deterrent system on the Golden Gate Bridge.

5. In July 2008, the District issued the draft Environmental Impact Report/Environmental Assessment and Section 4(f) evaluation for public comment in compliance with applicable California Environmental Quality Act ("CEQA") requirements. The Draft EIR/EA identified five "build" alternatives under the District's Policy Criteria for a physical suicide deterrent system. The District held numerous public meetings and received over 5,000 comments on the Draft EIR/EA. By Resolution 2008-090, adopted on October 10, 2008, the Board approved the selection of Alternative 3, a net system extending horizontally twenty feet below the sidewalk, as the Locally Preferred Alternative for the physical suicide deterrent system project ("Net System").

6. The California Department of Transportation issued a Finding of No Significant Impact for the project under the National Environmental Policy Act on January 19, 2010. A Final Environmental Impact Report and Environmental Assessment and Section 4(f) Evaluation with Finding of No Significant Impact was issued on January 22, 2010. By Resolution 2010-015, adopted on February 12, 2010, the Board of Directors certified the Final EIR/EA as compliant with the California Environmental Quality Act and State CEQA Guidelines, adopted Findings of Fact, and a Statement of Overriding Considerations to support its certification. The Board adopted Alternative 3, the Net System, along with certain mitigation measures identified in the Final EIR/EA to be incorporated as part of the approved alternative.

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7. With the completion of the Studies and successful conclusion of the federally and state mandated environmental processes, the Project was ready to proceed to the final design phase. In July 2010, the Metropolitan Transportation Commission approved \$5 million in Federal Surface Transportation Program/Congestion Mitigation and Air Quality Improvement Program funds for the final design of the project. By Resolution 2010-068, adopted on August 13, 2010, the Board of Directors authorized acceptance of these funds and issuance of a Request for Proposals for the final design of the physical suicide deterrent system. By Resolution 2011-059, adopted on June 24, 2011, the Board awarded a professional services agreement to HNTB Corporation for the final design work in the amount of \$3,990,000. Subsequent amendments to the scope of work has increased the design contract to \$ 4,190,000. The consultant has completed the final design, and development of detailed construction contract documents for advertising the project is currently underway.

8. Subsequent to the certification of the Final EIR/EA, the Board of Directors and staff have engaged in extensive efforts to obtain construction funding for the Project. Advocacy for construction funding has taken place at the federal, state and regional levels of government. As a result of these efforts, specific legislation was obtained in MAP-21, the 2012 federal surface transportation funding authorization bill, to deem suicide deterrent systems on bridges eligible for federal funding. Based thereon, the District now anticipates receiving \$22 million in federal Highway Bridge Program funds programmed by the California State Department of Transportation. Additionally, the District anticipates receipt of \$27 million in federal Surface Transportation Program funds programmed by the Metropolitan Transportation Commission and \$7 million from California Mental Health Service Act (Proposition 63) funds, leaving a projected shortfall of approximately \$20 million required to fully fund the project construction cost of the Project.

9. The assiduous efforts of members of the Board and District staff have resulted in the commitment of approximately 75% of total Project costs, inclusive of technical studies, environmental compliance efforts, preliminary and final design and projected construction costs, from external sources. However, as a condition to the receipt of these funds, a local funding contribution will be required.

10. The Board has carefully weighed all public input on the use of District revenues for the construction of the physical suicide deterrent system on the Bridge, and the competing priorities for the District's limited resources. It is mindful of the serious fiduciary responsibility it bears for ensuring that the District's fundamental mission is carried out. That mission consists of providing safe and reliable operation, maintenance and enhancement of the Golden Gate Bridge, and to provide transportation services, as resources allow, for customers within the U.S. Highway 101 Golden Gate Corridor. In the considered opinion of the Board, the implementation of safety measures, such as the imminent installation of a movable barrier on the Golden Gate Bridge, as well as a project intended to mitigate the risk of suicides off the Golden Gate Bridge, are in keeping with that mission.

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11. Based upon the foregoing, the Board of Directors hereby finds and determines, that as a matter of policy the construction of a suicide deterrent on the Golden Gate Bridge is eminently appropriate and justified for several reasons, including:

a. Various District personnel, including District patrol officers, ironworkers, painters, laborers and others, undertake suicide prevention activities that pose safety risks to each of them when they are called upon or volunteer to intercede by undertaking efforts to prevent individuals from jumping. There is a public purpose to be served by construction of a physical suicide deterrent system to mitigate these safety risks to District personnel;

b. Suicide incidents also impose risks to users of the Bridge sidewalks, as well as to motorists who may be distracted while driving across the Golden Gate Bridge. Thus, there is a public purpose to be served by construction of a physical suicide deterrent system to mitigate safety risks to these users of the Golden Gate Bridge;

c. A unique opportunity exists to leverage a comparatively small amount of District derived dollars in order to receive the preponderance of the projected construction costs from federal and state funding sources;

d. From a longer term perspective it is expected that the construction of the Project will provide the District with the opportunity to re-evaluate staffing levels, as suicide prevention will no longer be a significant part of our security staff's duties. This is anticipated to result in fewer staff and associated ongoing annual savings; and

e. After considerable thought, reflection and soul searching, and attentive consideration to the range of views expressed by members of the public, many of whom have testified as to the impact and consequences of suicide on their lives, the Board has concluded that construction of the suicide deterrent simply is the right thing to do at this time.

NOW, THEREFORE, BE IT RESOLVED by the Board of Directors of the Golden Gate Bridge, Highway and Transportation District that the Bridge Division Fiscal Year 2014-15 Capital Budget be amended to include \$76 million for the construction of the Golden Gate Bridge Physical Suicide Deterrent System (Net System) Project, with the understanding that the project will be funded with \$22 million of federal Highway Bridge Program funds programmed by Caltrans, \$27 million of federal Surface Transportation Program funds programmed by the Metropolitan Transportation Commission, \$7 million of California Mental Health Service Act funds (Proposition 63) and \$20 million from District reserves.

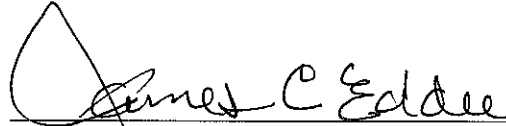
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ADOPTED this 27th day of June, 2014, by the following vote of the Board:

AYES (19): Directors Arnold, Belforte, Breed, Campos, Cochran, Fredericks, Moylan, Pahre, Rabbitt, Reilly, Sears, Snyder, Sobel, Theriault, Wiener and Yee; Second Vice President Stroeh; First Vice President Grosboll; President Eddie.

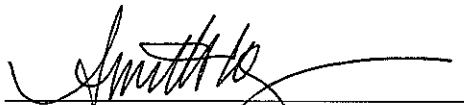
NOES (0): None.

ABSENT (0): None.



James C. Eddie
President, Board of Directors

ATTEST:



Amorette M. Ko-Wong
Secretary of the District