

CRS Report for Congress

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NASA's Space Shuttle Program: Space Shuttle Appropriations FY1992-FY2002

Daniel Morgan and Amanda Jacobs
Resources, Science, and Industry Division

Summary

This report shows the funding the George H.W. Bush, Clinton, and George W. Bush Administrations requested for the space shuttle program between FY1992 and FY2002, the funding provided in the House and Senate appropriations bills each year, and the final funding appropriated after the House-Senate conference. It also summarizes the explanations given in report language for congressional changes to the funding requested. This report will not be updated.

On February 1, 2003, NASA's Space Shuttle *Columbia* broke apart while returning to Earth, and all seven astronauts aboard were killed. (See CRS Report RS21408.) In the aftermath of this tragedy, there is congressional interest in the history of funding for the space shuttle program.

Table 1 shows the funding the George H.W. Bush, Clinton, and George W. Bush Administrations requested for the space shuttle program between FY1992 and FY2002, the funding provided in the House and Senate appropriations bills each year, and the final funding appropriated after the House-Senate conference. **Table 2** summarizes the explanations given in report language for congressional changes to the funding requested. Note that the amount appropriated for any given year is not necessarily the same as the amount actually spent in that year, because NASA can make funding changes between appropriations cycles as part of its operational planning, and because some funds can be spent over a two-year period and may thus be spent in the fiscal year following the year for which they were appropriated.

Table 1. Requested and Appropriated Funding for the Space Shuttle Program
(dollars in millions)

Fiscal Year	Request	House	Senate	Conference ^a
FY1992 ^{b,c}	4,312.5	4,487.5	4,100.9	4,026.4
FY1993 ^c	4,128.0	4,228.0	4,038.0	4,048.0
FY1994 ^c	4,196.1	3,820.2	3,813.7	3,803.6
FY1995	3,324.0	3,197.0	3,183.0	3,183.0
FY1996	3,231.8	3,178.8	3,081.8	3,178.8
FY1997	3,150.9	3,150.9	3,150.9	3,150.9
FY1998	2,977.8	2,977.8	2,977.8	2,927.8
FY1999	3,059.0	3,027.0	3,059.0	3,028.0
FY2000	2,986.2	2,836.2	2,986.7	3,011.2
FY2001	3,165.7	3,165.7	3,165.7	3,135.7
FY2002	3,283.8	3,318.8	3,333.8	3,278.8

^aConference amounts are computed relative to the request by adding increases noted in the conference report and subtracting reductions noted in the conference report. Subsequent changes, such as those made by supplemental appropriations acts, are not reflected in this table. See Table 2 for details.

^bIn FY1992, space shuttle operations were funded as part of Space Transportation Operations. The amounts shown above for FY1992 exclude \$341.9 million in Space Transportation Operations that was labeled separately as Expendable Launch Vehicles in subsequent years.

^cUp to FY1994, some activities related to the space shuttle were funded as part of Space Transportation Capability Development in the budget for Research and Development. Many of these activities have since been canceled. Others are now funded as part of Payload Utilization and Operations. For comparability with other sources, the figures in this table do not include funding for these activities.

Source: CRS, from NASA budget documents and congressional committee reports.

Table 2. Explanations Given in Appropriations Reports for Congressional Changes versus Administration Budget Requests for the Space Shuttle Program

Fiscal Year	House	Senate	Conference
FY1992	+\$175m for the Advanced Solid Rocket Motor (ASRM) program	-\$50m from ASRM -\$7.7m from structural spares -\$25m from assured shuttle availability (concern about advanced turbo pump) -\$128.9m from shuttle operations	+\$115m for ASRM -\$27.7m from structural spares -\$40m from assured shuttle availability -\$330m from shuttle operations -\$3.4m from shuttle production ^a
FY1993 ^b	+\$315m for ASRM -\$60m from shuttle production (concern about advanced turbo pump) -\$155m from shuttle operations	+\$25m for ASRM -\$50m from shuttle production -\$75m from shuttle operations +\$10m for structural spares	+\$165m for ASRM ^c -\$60m from shuttle production -\$155m from shuttle operations -\$10m from structural spares -\$20m from research operations support
FY1994 ^d	-\$165m from shuttle operations -\$35m from structural spares -\$175.9m from shuttle production and operational capability (detailed breakdown not explicit but termination of ASRM mentioned)	-\$200m from shuttle operations -\$25m from structural spares -\$150.4m from ASRM -\$5m from launch and mission support -\$2m from program support	-\$200m from shuttle operations -\$30m from structural spares -\$155.5m from ASRM -\$5m from launch and mission support -\$2m from program support
FY1995	-\$127m at NASA discretion	-\$94m general reduction from shuttle operations -\$30m termination of shuttle checkout upgrade -\$17m rephasing of cable upgrades in payload bay	(same as Senate) ^e

Fiscal Year	House	Senate	Conference
FY1996	unspecified savings from closure of the Yellow Creek solid rocket motor facility (included in Table 1 as a reduction of -\$53m)	-\$53m from closure of the Yellow Creek facility -\$97m general reduction to “maximize budget savings while continuing to place safety first”	-\$53m from closure of the Yellow Creek facility
FY1997	(no change)	(no change)	(no change)
FY1998	(no change)	(no change)	-\$50m reallocated to space station
FY1999	-\$32m because two fewer flights planned	(no change)	-\$31m transferred to mission support
FY2000	-\$150m “unable to accommodate additional funding” for upgrades	+\$0.5m	+\$25m for urgent safety upgrades
FY2001	(no change)	(no change)	-\$30m from shuttle reserves ^f
FY2002	+\$35m for refurbishment of vehicle assembly building	+\$50m for safety upgrades	+\$25m for vehicle assembly building +\$20m for safety upgrades -\$50m from cancellation of the Electric Auxiliary Power Unit program

^a The FY1992 conference report provided NASA with authority to make certain transfers from the Research and Program Management account into the Space Flight, Control, and Data Communications account, which funded the space shuttle program. The details of these transfers were not specified in the conference report and are not reflected in Table 1. They may partially account for differences between Table 1 and some budget history material produced by NASA.

^b A supplemental appropriations act for FY1993 subsequently reduced funding for Space Flight, Control, and Data Communications by \$27.2 million but did not specify how much of this amount should be applied to the space shuttle program. This subsequent action is not reflected in Table 1. It may partially account for differences between Table 1 and some budget history material produced by NASA.

^c Some budget history material produced by NASA shows an increase of \$195 million for ASRM in FY1993. The increase of \$165 million shown above corresponds to the language of the conference report (H.Rept. 102-902). Only the \$165 million increase is reflected in Table 1.

^d A supplemental appropriations act for FY1994 subsequently reduced funding for shuttle operations by a further \$20 million. This subsequent action is not reflected in Table 1. It may partially account for differences between Table 1 and some budget history material produced by NASA.

^e Some budget history material produced by NASA shows a general reduction of \$168.9 million for Human Space Flight in FY1995 and states that all of this reduction was applied to the space shuttle program. The congressional changes specified above (and reflected in Table 1)

correspond to the language of the conference report (H.Rept. 103-715), which does not mention the figure \$168.9 million or any general reduction for Human Space Flight.

^f The FY2001 conference report reduced funding for Human Space Flight by \$40 million to provide additional funds for the Mars Lander program. This change was requested by NASA after submission of its regular budget request. The conference report specified that \$30 million of the reduction should come from space shuttle reserves and \$10 million should come from “the commercialization and technology program.” The latter appears to be the Technology and Commercialization Initiative (HTCI), which was funded as part of Investments and Support, not as part of Space Shuttle. Some budget history material produced by NASA includes the full \$40 million as a reduction in space shuttle funding. Only the \$30 million reduction is reflected in Table 1.

Note: ASRM is the Advanced Solid Rocket Motor program.

Source: CRS, from congressional committee reports.