

VERSION 1.0



U.S. DOD DESIGNATION SYSTEM

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A. DESIGNATION SYSTEM FOR AIRCRAFT

Each DOD aircraft designation has one letter to denote its primary function or capability (basic mission). For all non-regular aircraft now follows a vehicle type designator (the UH-1H uses the H as vehicle type designator to indicate it is a helicopter, the F-15, F/A-18 and NKC-135 are regular aircraft and do not have a vehicle type designator). To this, one or more prefixes are added to denote modified mission and status for the aircraft. A U.S. military aerospace vehicle designation is also known as an "MDS Designation". MDS stands for "Mission-Design-Series", naming the three most important components of the designation. An MDS looks as:

(6)	(3)	(2)	(1)	-	(4)	(5)
Status Prefix	Modified Mission	Basic Mission	Vehicle Type		Design Number	Series Letter

		F		-	15	C
--	--	---	--	---	----	---

Fighter

3rd Variant



		U	H	-	1	H
--	--	---	---	---	---	---

Utility

Helicopter

8th Variant



		F/A		-	18	E
--	--	-----	--	---	----	---

*Fighter /
Ground
Attacker*

5th Variant



Y	R	A	H	-	66	A
---	---	---	---	---	----	---

Prototype

Recon

*Ground
Attack*

Helicopter

1st Variant



	M		Q	-	9	A
--	---	--	---	---	---	---

*Multi-
mission*

UAV

1st Variant



N	K	C		-	135	A
---	---	---	--	---	-----	---

*Perma-
nent
Test*

Tanker

Cargo

1st Variant



A. DESIGNATION SYSTEM FOR AIRCRAFT
(1) VEHICLE TYPE DESIGNATOR

All aircraft which are not "normal" aeroplanes (i.e. powered, fixed-wing, heavier-than-air, non-VTOL, manned, atmospheric aircraft), use one of the following symbols to designate the type of aerospace craft:

Letter	Title	Description
G	Glider	Heavier-than-air aircraft primarily intended for unpowered flight.
H	Helicopter	A helicopter is a type of rotorcraft in which lift and thrust are supplied by rotors. This allows the helicopter to take off and land vertically, to hover, and to fly forward, backward, and laterally. These attributes allow helicopters to be used in congested or isolated areas where fixed-wing aircraft and other forms of vertical takeoff and landing aircraft cannot perform.
Q	UAV	An unmanned aerial vehicle (UAV), commonly known as a drone, is an aircraft without a human pilot aboard. Its flight is controlled either autonomously by onboard computers or by the remote control of a pilot on the ground or in another vehicle.
S	Spaceplane	A spaceplane is a vehicle that operates as an aircraft in Earth's atmosphere, as well as a spacecraft when it is in space.
V	VTOL/STOL	Aircraft designed for vertical takeoff or landing with no takeoff or landing roll, or aircraft capable of takeoff and landing in a minimum prescribed distance. (type symbol)
Z	Lighter than air	Lighter than air refers to materials (usually gases) that are buoyant in air because they have densities lower than that of air (about 1.2 kg/m ³ , 1.2 g/L). Some of these gases are used as lifting gases in lighter-than-air aircraft, which include free balloons, moored balloons, and airships, to make the whole craft, on average, lighter than air. Heavier-than-air aircraft include airplanes, gliders and helicopters.

A. DESIGNATION SYSTEM FOR AIRCRAFT

(2) BASIC MISSION DESIGNATOR

This is the most important designator. It indicates the primary design task of the aircraft. (Example: The B-1B uses a B because it is a bomber).

Letter	Title	Description
A	Ground Attack	Aircraft designed to search out, attack and destroy enemy land or sea targets, using conventional or special weapons. This symbol also applies to aircraft used for interdiction and close air support missions.
B	Bomber	Aircraft designed for bombing targets.
C	Cargo / Transport	Aircraft designed for carrying cargo, passengers or medical patients.
E	Special Electronic Installation	Aircraft modified with electronic devices for employment in one Installation or more of the following missions: <ol style="list-style-type: none"> 1. Electronic countermeasures 2. Airborne early warning radar 3. Airborne command and control, including communications relay 4. Tactical data communications link for all non-autonomous modes of flight.
F	Fighter	Aircraft designed to intercept and destroy other aircraft and/or missiles (includes multi-purpose aircraft also designed for ground support mission); for example, interdiction and close air support.
O	Observation	Aircraft designed to observe (through visual or other means) and report tactical information concerning composition and disposition of enemy forces, troops and supplies in an active combat area.
P	Maritime Patrol	Long-range, all-weather, multi-engine aircraft operating from land and/or water bases, designed for independent accomplishment of: antisubmarine warfare, maritime reconnaissance and mining function. <i>(Note: The U.S. Army Air Service used the term "P" for pursuit aircraft, adapted from the French Avion de Chasse for pursuit or hunt airplane. After World War II, the term fighter was formally adopted by the USAF with the designator "F.")</i>
R	Reconnaissance: ER - Electronic Reconnaissance SR - Strategic Reconnaissance TR - Tactical Reconnaissance	Aircraft designed to perform reconnaissance missions.
S	Anti-Submarine Warfare (ASW)	Aircraft designed to search out, detect, identify, attack and destroy enemy submarines.
T	Trainer	Aircraft designed for training personnel in the operation of aircraft and or related equipment, and having provisions for instructor personnel.
U	Utility	Aircraft designed for miscellaneous missions, such as carrying cargo and/or passengers, towing targets, etc. These aircraft will include those having a small payload.
X	Research	Aircraft designed for testing configurations of a radical nature. These aircraft are not normally intended for use as tactical aircraft.

A. DESIGNATION SYSTEM FOR AIRCRAFT

(3) MODIFIED MISSION DESIGNATOR

To the left of the basic mission symbol an optional modified mission letter can be used, when an aircraft is used for a different purpose than originally designed. The regulations say that not more than one modified mission letter can be used, but this rule has been violated a few times, e.g. in the EKA-3B designation. Designations, which include a vehicle type symbol, can optionally omit the basic mission letter if a modified mission letter is used instead (as shown by the MQ-9A example). The modified mission symbols are in general the same as the basic mission symbols, but add a few more letters. The following modified mission symbols are defined:

Letter	Title	Description
A	Ground Attack	Aircraft modified to search out, attack and destroy enemy land or sea targets, using conventional or special weapons. This symbol also describes aircraft used for interdiction and close air support missions.
C	Cargo / Transport	Aircraft modified for carrying cargo, passengers or medical patients.
D	Drone Director	Aircraft modified for controlling drone aircraft or a missile.
E	Special Electronic Installation	Aircraft modified with electronic devices for employment in one Installation or more of the following missions: <ol style="list-style-type: none"> 1. Electronic countermeasures 2. Airborne early warning radar 3. Airborne command and control, including communications relay 4. Tactical data communications link for all non-autonomous modes of flight.
H	Search and Rescue (SAR), Medevac	Aircraft modified and equipped for performance of search and rescue missions.
K	Tanker (from Kerosine tanker)	Aircraft modified and equipped to provide in-flight refueling of other aircraft.
L	Equipped for Cold Weather Operations	Aircraft modified for operation in the Arctic and Antarctic regions; includes skis, special insulation and other ancillary equipment required for extreme cold weather operations.
M	Multimission	Aircraft modified for aerial mine countermeasures and minesweeping missions. The original "M" (Missile Carrier) modified mission symbol was needed for the redesignations in 1962, because the U.S. Navy had a special designation letter for missile-capable aircraft. However, it was never used after 1962 (when missile armament was a common feature anyway) for new designations, and was therefore eventually dropped. It was briefly replaced by "Mine Countermeasures" before the final "Multimission" meaning was assigned.
O	Observation	Aircraft modified to observe (through visual or other means) and report tactical information concerning composition and disposition of enemy forces, troops and supplies in an active combat area.
P	Maritime Patrol	Long-range, all-weather, multi-engine aircraft operating from land and/or water bases, modified for independent accomplishment of: antisubmarine warfare; maritime reconnaissance; and mining function.

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Q	Unmanned Drone	Aircraft modified to be controlled from a point outside the aircraft.
R	Reconnaissance	Aircraft modified and permanently equipped for photographic and/or electronic reconnaissance missions.
S	Anti-Submarine Warfare (ASW)	Aircraft modified so that it can function to search, identify, attack and destroy enemy submarines.
T	Trainer	Aircraft modified and equipped for training purposes.
U	Utility	Aircraft, having small payload, modified to perform miscellaneous missions, such as carrying cargo or passengers, towing targets, etc.
V	Staff / VIP Transport	Aircraft modified to provide accommodations, such as chairs, tables, lounge, berths, etc. for the transportation of staff personnel. The "V" symbol was originally used for all staff transport aircraft, but is nowadays limited to aircraft used by the President of the United States.
W	Weather	Aircraft modified and equipped for meteorological missions.
X	Research	Aircraft modified for testing configurations of a radical nature. These aircraft are not normally intended for use as tactical aircraft.

A. DESIGNATION SYSTEM FOR AIRCRAFT**(4) DESIGN NUMBER**

Each vehicle type and basic mission symbol is used to form a separate series of design numbers. E.g., all helicopters are designated in a single numerical sequence, while "normal" aircraft are designated in separate series according to their basic mission.

According to the instructions, the numbers in each series are to be assigned in strict numerical sequence without reference to manufacturers' model numbers and/or existing numbers in other MDS series.

However, this rule is rather often violated nowadays, e.g. by using the manufacturer's model number (e.g. KC-767A), retaining the number when a new designation in another series is assigned (e.g. the production variant of the X-35 was designated F-35, although the next number in the F-series was 24), or allocating "special" numbers (e.g. X-50A, T-6A). For more information on these and other examples, see article on Non-Standard DOD Aircraft Designations. Also, sometimes numbers are skipped in one series because they are in use at the same time in another series (e.g. C-34 was skipped to "avoid confusion" with T-34).

A. DESIGNATION SYSTEM FOR AIRCRAFT**(5) SERIES LETTER**

Variants of a basic aircraft type are designated by a suffix letter. The first model always receives suffix "A" and subsequent series letters are to be assigned in strict sequence (omitting "I" and "O" to avoid confusion with numerals "1" and "0"). The series letter is actually a mandatory component of a conforming MDS, and therefore "plain" designations like "F-16" always designate the general type of aircraft and never a specific model. Of course, the sequence rule is often ignored and there are many designations with out-of-sequence suffixes (e.g. to designate a specific customer, like the "N" in F-16N designated "Navy") or even "special" suffixes as in AV-8B(R)+. It is not well defined, which kind of modifications actually mandate the assignment of a new series letter. In the more recent past, even extensive modifications to an aircraft type have sometimes not led to a different series designation, e.g. a currently produced F-16C is much different from an early production F-16C.

A. DESIGNATION SYSTEM FOR AIRCRAFT
(6) STATUS PREFIX DESIGNATOR

Any aircraft, which is not in normal operational service, can receive a prefix letter in its designation to reflect its current status. Because both modified mission and status prefix letters can appear to the left of the basic mission symbol, both groups of letters are distinct to avoid ambiguities. The following status prefixes are defined:

Letter	Title	Description
G	Permanently Grounded	
J	Special Test, Temporary	A "J" prefix is used if the aircraft is planned to be converted back to standard configuration after the tests have ended.
N	Special Test, Permanent	The "N" prefix is used for aircraft, which are modified so extensively for special tests, that a reconversion to the original configuration is neither planned nor feasible at reasonable costs.
X	Experimental	
Y	Prototype	
Z	Planning	Although the "Z" status prefix is still listed in the regulations, it is nowadays rarely used. Current aerospace vehicle projects very rarely receive a designation before the actual prototype is under construction, and even if they do the "Z" prefix is often not applied.

**A. DESIGNATION SYSTEM FOR AIRCRAFT
ADDITIONAL ELEMENTS**

There are three additional elements of a military aircraft designation, which are not part of the MDS proper, but which are nevertheless often encountered. These elements can be seen in the designations:

(MDS)	-	(8) Block Number	-	(9) Manu. Code	(7) Popular Name
-------	---	------------------------	---	----------------------	------------------------

F-15E	-	51	-	MC	<i>Eagle</i>
-------	---	----	---	----	--------------



EA-6B	-	40		GR	<i>Prowler</i>
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F-16D	-	52	-	LM	<i>Fighting Falcon</i>
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F/A-22A	-	20		LM	<i>Raptor</i>
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A. DESIGNATION SYSTEM FOR AIRCRAFT

(7) POPULAR NAME

Many U.S. military aircraft have an official "popular name" assigned. This official name can't be assigned by the manufacturer and/or DOD customer at will, but has to run through an approval process in which proposed names are checked for conflicts with existing names (both military and commercial) and their "political correctness". Of course, official names tend to be disregarded by the people actually flying or maintaining the aircraft.

Alphabetical list of popular aircraft names:

Popular Name (1)	Original Navy Designation, pre-1962	Redesignation to the Post 1962 Designation System or New Post 1962 Designation
Academe		TC-4C
Aero Commander		U-9
Albatross	JR2F/UF	U-16
Avenger	TBF TBM	
Avenger II		A-12 (never acquired)
Aztec	UO	U-11
Banshee	F2H	F-2
Bearcat	F8F	
Beaver		U-6
Bird Dog	(OE)	O-1
Black Widow	F2T	
Bobcat	JRC	
Bronco		OV-10
Buccaneer	SB2A	
Buckeye	T2J	T-2
Buffalo	F2A	
Buffalo		UC-8A
Catalina	PBY PB2B PBN	
Caydet (also Kaydet)	N2S	
Cayuse		OH-6A/B

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Popular Name (2)	Original Navy Designation, pre-1962	Redesignation to the Post 1962 Designation System or New Post 1962 Designation
Chickasaw	(HO4S-3) (HRS-3)	H-19 H-19
Cobra		AH-1
Cochise		T-42A
Commando	R5C	
Connestoga	RB	
Constellation (see Warning Star)	PO WV-1 R70/R7V	C-121
Constitution	R60/R6V	
Convair Liner	R4Y	C-131
Coronado	PB2Y	
Corsair	F4U FG F3A AU F2G	
Corsair II		A-7
Cougar	F9F-6,-7,-8	F-9
Crusader	F8U	F-8
Crusader III Cutlass	F8U-3 F7U	
DASH	(DSN)	QH-50
Dauntless	SBD	
Demon Destroyer	F3H (SB2D) BTD	F-3
Devastator	(XTB2D-1) TBD	
Dolphin		H-65
Duck	(JF)	J2F
Excalibur	JR2S	

Popular Name (3)	Original Navy Designation, pre-1962	Redesignation to the Post 1962 Designation System or New Post 1962 Designation
Expediter	JRB-1 thru -4	C-45
Falcon	SNC	
Fighting Falcon		F-16
Fireball	FR	
Flying Classroom		T-29
Flying Fortress	PB-1G, -1W	
Forwarder	GK	
Fury	FJ	F-1
Goose	JRF	
Goshawk		T-45
Grasshopper	NE	
Greyhound		C-2
Guardian	AF	
Gulfstream		C-20D
Harpoon	PV-2	
Harrier		AV-8A
Harrier II		AV-8B
Havoc	BD	
Hawkeye	W2F	E-2
Hellcat	F6F	
Helldiver	SB2C SBC-3,-4 SBW SBF	
Hercules	GV	C-130
Hermes (see Mercury)		E-6 (changed to Mercury)
Hornet		F/A-18
Hoverfly	HNS-1	

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Popular Name (4)	Original Navy Designation, pre-1962	Redesignation to the Post 1962 Designation System or New Post 1962 Designation
Hudson	PBO	
Huron		UC-12B
Huskie	(HOK) (HUK)	H-43
Intruder	A2F	A-6
Invader	JD	B-26
Iroquois		UH-1/TH-1
Jaguar	F1OF	
Kansan	SNB-1	
Kaydet (see Caydet)	N2S	
Kfir		F-21A
Kingfisher	OS2U OS2N	
Kiowa		OH-58A
Liberator	PB4Y-1/P4Y-1	
Liberator Express	RY-1	
Liftmaster	R6D	C-118
Lodestar	R50	
Marauder	JM	
Mariner	PBM	
Marlin	P5M	P-5
Mars	PB2M JRM	
Mauler	(BTM-1), AM	
Mentor	T-34	T-34
Mercator	P4M	
Mercury		E-6A
Mescalero		T-41B

Popular Name (5)	Original Navy Designation, pre-1962	Redesignation to the Post 1962 Designation System or New Post 1962 Designation
Mitchell	PBJ	
Mohawk		OV-1A/B/C
Mojave	(HR2S)	H-37
Navigator	SNB-2C, -5	C-45
Neptune	P2V	P-2
Nightingale	GH, NH	
Norseman	JA	
Orion	P3V	P-3
Osprey		V-22A
Otter	UC	U-1
Packet	R4Q	C-119
Panther	F9F-2, -4, -5	DF-9
Phantom	FD, FH	
Phantom II	F4H	F-4
Pinto	TT-1	
Pirate	F6U	
Privateer	PB4Y-2, P4Y-2	QP-4B
Prowler		EA-6B
Puss Moth	XDH-80	
Raptor		F-22
Recruit	NR	
Reliance	ZPG-2W	EZ-1
Rescuer	HRP	
Retriever	HUP	H-25
Sabre	(F-86)	QF-86
Sabreliner	(T3J)	T-39
Samaritan		C-131

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Popular Name (6)	Original Navy Designation, pre-1962	Redesignation to the Post 1962 Designation System or New Post 1962 Designation
Savage	AJ	A-2
Sea Bat	(HSS-1)	H-34
Sea Cobra		AH-1J/T/W
Sea Dart	F2Y	F-7
Sea Dragon		MH-53
Seafarer	ZPG-2	SZ-1
Seagull (not official)	SOC, SO3C	
Seahawk	SC	
Sea Hawk		SH-60B
Seahorse	(HUS)	H-34
Sea King	(HSS-2)	H-3
Sea Knight	(HRB)	H-46
Seamaster	P6M	
Seamew	SO3C	
Sea Ranger	XPBB-1	
Sea Ranger		H-57
Seasprite	HU2K	H-2
Sea Stallion		H-53 thru H-53D
Sea Star	T2V	T-1
Sea Wolf (also Seawolf)	TBY	
Seminole		U-8
Sentinel	OY	
Shadow		ES-3A
Shooting Star	TV, TO	T-33
Sioux	(HTL), HUL	H-13
Skyhawk	A4D	A-4
Sky Knight	F3D	F-10

Popular Name (7)	Original Navy Designation, pre-1962	Redesignation to the Post 1962 Designation System or New Post 1962 Designation
Skylander	F5D	
Skymaster	R5D	C-54
Skyraider	(BT2D), AD	A-1
Skyray	F4D	F-6
Skyrocket	D-558-2	
Skyshark	A2D	
Skytrain	R4D-1, -5, -6, -7	C-47
	R4D-8	C-117
Skytrain II		C-9
Skystreak	D-558-1	
Skytrooper	R4D-2,-3,-4	
Skywarrior	A3D	A-3
Stratojet		EB-47E
Stratotanker		NKC-135A
Super Fortress		P2B-1
Super Stallion		CH-53E/RH-53/MH-53E
Talon		T-38
Texan	SNJ	
Thunderbolt	P-47	
Thunderbolt II		A-10
Tiger	F11F	F-11
Tiger II		F-5
Tigercat	F7F	
Tomcat		F-14
Tracer	WF	E-1
Tracker	S2F	S-2
Trader	TF-1	C

Popular Name (8)	Original Navy Designation, pre-1962	Redesignation to the Post 1962 Designation System or New Post 1962 Designation
Tradewind	R3Y	
Traveler	GB	
Trojan	T-28	T-28
Tutor	N2T	
Ute		U-21A
Valiant	SNV	
Ventura	PV-1, -3	
Vigilante	A3J	A-5
Viking		S-3
Vindicator	SB2U	
Volunteer	ZSG-1	
Warning Star	WV	EC-121
White Hawk		VH-60N
Widgeon	J4F	
Wildcat	F4F FM	

A. DESIGNATION SYSTEM FOR AIRCRAFT**(8) BLOCK NUMBER**

Block numbers are not part of the official MDS designation, and their use is optional to the various DOD services. In fact, block numbers are used for some production aircraft (e.g. the F-15) but not all. Block numbers were introduced by the U.S. Army Air Force in World War II to distinguish between minor sub-variants of a specific aircraft variant, and were originally assigned in steps of five (1, 5, 10, 15, ...), with the gaps being intended to be used for modifications after production. This was also the rule for block numbers as defined in the first issue of the current designation system in 1962. The current AFI 16-401(I), however, defines block numbers as optional and doesn't state any rules for their actual application. In fact, there are several aircraft types where the block numbers were assigned in strict sequence from 1 up, leaving no gaps. It also seems that the USAF doesn't generally use the "dash-number" nomenclature any more, e.g. the latest B-2A update is generally referred to as "B-2A Block 30" and not "B-2A-30".

A. DESIGNATION SYSTEM FOR AIRCRAFT
(9) MANUFACTURER CODE LETTER

The original designation system as defined in 1962 also mandated the use of a two-letter code suffix to identify the manufacturing plant of an aircraft. Like the block numbers, these code letters were introduced by the USAAF during World War II. However, manufacturers' codes were officially dropped from the regulations in 1976. Therefore they are definitely no longer mandatory, and even their optional use has apparently essentially ceased. The list of code letters as defined in 1962 follows:

AE - Aeronca Aircraft Corp., Middletown, Ohio

BC - Bell Aerosystems Co., Buffalo, New York

BF - Bell Helicopter Corp., Forth Worth, Texas

BH - Beech Aircraft Corp., Wichita, Kansas

BN - Boeing Co., Renton, Washington

BO - Boeing Co., Seattle, Washington

BV - Boeing Co. (Vertol Division), Morton, Pennsylvania

BW - Boeing Co., Wichita, Kansas

CE - Cessna Aircraft Co., Wichita, Kansas

CF - Convair, Forth Worth, Texas

CO - Convair, San Diego, California

DH - DeHavilland Aircraft of Canada, Toronto, Canada

DL - Douglas Aircraft Co., Inc., Long Beach, California

DM - Doman Helicopter, Inc., Danbury, Connecticut

DO - Douglas Aircraft Co., Inc., Santa Monica, California

DT - Douglas Aircraft Co., Inc., Tulsa, Oklahoma

FA - Fairchild Aircraft Division, Hagerstown, Maryland

GO - Goodyear Aircraft Co., Akron, Ohio

GR - Grumman Aircraft Corp., Bethpage, New York

GT - Grand Central Aircraft Co., Tucson, Arizona

GY - Gyrodyne Co. of America, Inc., St. James, New York

HE - Helio Aircraft Corp., Norwood, Massachusetts

HI - Hiller Helicopter Corp., Palo Alto, California

HU - Hughes Tool Co., San Diego, California

KA - Kaman Helicopter Corp., Windsor Locks, Connecticut

LM - Lockheed Aircraft Corp., Marietta, Georgia

LO - Lockheed Aircraft Corp., Burbank, California

MA - The Martin Co., Baltimore, Maryland

MC - McDonnell Aircraft Corp., St. Louis, Missouri

MD - The Martin Co., Denver, Colorado

MF - The Martin Co., Orlando, Florida

NA - North American Aviation, Inc., Inglewood, California

ND - Noorduyn Aviation Co., Ltd., Montreal, Canada

NH - North American Aviation, Inc., Columbus, Ohio

NI - North American Aviation, Inc., Downey, California

NO - Northrop Aircraft, Inc., Hawthorne, California

PA - Piper Aircraft Corp., Lockhaven, Pennsylvania

PI - Piasecki Aircraft Corp., Philadelphia, Pennsylvania

RE - Republic Aviation Corp., Farmingdale, New York

RY - Ryan Aeronautical Co., San Diego, California

SI - Sikorsky Aircraft Division, Stratford, Connecticut

SW - Schweizer Aircraft Corp., Elmira, New York

TA - Taylorcraft Aviation Corp., Alliance, Ohio

VO - Chance Vought Aircraft, Dallas, Texas (later changed to CV)

B. DESIGNATION SYSTEM FOR GUIDED MISSILES, ROCKETS, BOOSTERS AND SATELLITES

The designations used for most guided missiles, unguided rockets, and other self-propelled flying vehicles follow the general format illustrated below:

(1)	(2)	(3)	(4)	-	(5)	(6)	-	(7)	(8)
Status	Launch Environment	Basic Mission	Vehicle Type		Design Number	Series		Configuration Number	Name

C	A	T	M	-	9	M	-	8	Sidewinder
Captive	Air	Training	Missile		9 th Missile	12 th Variant		8 th Subvariant	



	A	I	M	-	120	C	-	4	AMRAAM
	Air	Intercept	Missile		120 th Missile	3 rd Variant		4 th Subvariant	



Z	A	I	M	-	132	A			ASRAAM
Planned	Air	Intercept	Missile		132 nd Missile	1 st Variant			



	A	G	M	-	65	D			Maverick
	Air	Surface Attack	Missile		65 th Missile	4 th Variant			



B. DESIGNATION SYSTEM FOR GUIDED MISSILES, ROCKETS, BOOSTERS AND SATELLITES

(1) STATUS DESIGNATOR

This letter indicates the overall status of the weapon type or the individual example. These designations are commonly used in early design or flight test applications, but are seldom seen in production weapons or normal operations.

Letter	Title	Description
C	Captive	Vehicle that can be carried by a launch platform but cannot be fired, such as an air-launched missile that is not fitted with a rocket motor. These are often used during flight testing, for example.
D	Dummy	A dummy casing that carries no operational equipment (i.e. motor, warhead, guidance system). These may be used for training or aerodynamic flight tests.
J	Special Test (temporary)	Vehicle in special test programs whose configuration changes so drastically that returning to its original operational configuration is not practical.
M	Modified	Modified weapon.
N	Special Test (permanent)	Vehicle in special test programs whose configuration changes so drastically that returning to its original operational configuration is not practical.
X	Experimental or Prototype	A weapon that is still under development or evaluation and not in production.
Y	Prototype or Preserial	Aircraft designed to observe (through visual or other means) and report tactical information concerning composition and disposition of enemy forces, troops and supplies in an active combat area.
Z	Planned, Proposed, or Projected	A weapon that is still in early planning or pre-development stages.

B. DESIGNATION SYSTEM FOR GUIDED MISSILES, ROCKETS, BOOSTERS AND SATELLITES**(2) LAUNCH MODE OR ENVIRONMENT DESIGNATOR**

This letter indicates the type or types of launching platforms for which the weapon is designed.

Letter	Title	Description
A	Air	Launched from an air vehicle.
B	Multiple	Capable of being launched from more than one environment.
C	Coffin or Container	Ground-launched system that is stored horizontally or at an angle less than 45° in a protective enclosure.
F	Individual or Infantry	A man-portable weapon that is carried and launched by combat personnel.
G	Surface	Launched from the ground or a runway.
H	Silo Stored	Stored vertically in a silo but not launched from underground.
L	Silo Launched	Vertically stored and launched from underground.
M	Mobile	Launched from a ground vehicle or moveable platform.
P	Softpad	Ground-launched system that is stored in an unprotected or partially-protected state.
R	Ship	Launched from a surface vessel.
S	Space	Launched from a vehicle operating outside the Earth's atmosphere.
U	Underwater	Launched from an underwater location or a submarine.

B. DESIGNATION SYSTEM FOR GUIDED MISSILES, ROCKETS, BOOSTERS AND SATELLITES

(3) BASIC MISSION DESIGNATOR

This letter indicates the type of mission the weapon performs.

Letter	Title	Description
C	Cargo / Transport	Designed to carry personnel, cargo, command, control, and communications equipment or weapons systems.
D	Decoy	Designed or modified to confuse, deceive, or divert enemy defenses by simulating an attack vehicle.
E	Electronic Warfare or Special Electronic Equipment	Designed or modified with electronics equipment for communications, countermeasures, electronic radiation sounding, or other electronic recording or relay missions.
G	Surface Attack	Intended to attack land or sea targets, such as ground structures and vehicles or surface ships.
I	Intercept, Aerial or Space	Intended to attack aerial targets, such as aircraft or missiles, or space targets, such as missiles or satellites.
L	Launch Detection/Surveillance	Performs aerospace surveillance to detect and track satellites or in-flight missiles.
M	Scientific/Calibration	Designed for the collection, evaluation, analysis, and interpretation of scientific and technical information.
N	Navigation	Provides navigational data.
Q	Drone or Target	Remotely or automatically piloted aerospace vehicle.
S	Space Support	Vehicle designed to ensure maintainability of space control and support of terrestrial forces. Includes activities such as launching and deploying space vehicles, maintaining and sustaining space vehicles while in orbit and recovering space vehicles if required.
T	Training	Designed or permanently modified for training purposes.
U	Underwater Attack	Intended to attack sub-surface targets such as submarines.
W	Weather	Observes, records, or relays data pertaining to meteorological phenomena.

B. DESIGNATION SYSTEM FOR GUIDED MISSILES, ROCKETS, BOOSTERS AND SATELLITES**(4) VEHICLE TYPE INDICATOR**

This letter indicates the class of the vehicle itself.

Letter	Title	Description
B	Booster	A primary or auxiliary propulsion system used as a source of thrust for a satellite, missile, or aerospace vehicle. May consist of one or more units.
M	Guided Missile or Drone	An unmanned, self-propelled vehicle flying in or above the atmosphere with remote or internal trajectory guidance.
N	Probe	A non-orbital instrumented vehicle used to monitor and transmit environmental information.
R	Rocket	A self-propelled unguided vehicle whose flight trajectory cannot be altered after launch.
S	Satellite	An orbital vehicle that collects and transmits data.

B. DESIGNATION SYSTEM FOR GUIDED MISSILES, ROCKETS, BOOSTERS AND SATELLITES
(5) DESIGN NUMBER

This number indicates the sequential order of the weapon within that vehicle type.

B. DESIGNATION SYSTEM FOR GUIDED MISSILES, ROCKETS, BOOSTERS AND SATELLITES
(6) SERIES INDICATOR

This letter indicates a major variant of the weapon, "A" being the initial production model with subsequent models being indicated by subsequent letters. "I" and "O" are typically skipped to avoid confusion with "1" and "0".

B. DESIGNATION SYSTEM FOR GUIDED MISSILES, ROCKETS, BOOSTERS AND SATELLITES
(7) CONFIGURATION NUMBER

This number indicates a minor subvariant of the weapon.

C. DESIGNATION SYSTEM FOR ELECTRONIC EQUIPMENT

U.S. military electronic equipment is assigned an identifying alphanumeric designation that is used to uniquely identify it. This system is commonly called the "AN" designation system, although its formal name is the Joint Electronics Type Designation System (JETDS). The letters AN preceding the equipment indicators formerly meant "Army/Navy," but now are a letter set that can only be used to indicate formally designated DOD equipment. The first three letters following the "AN/" indicate Platform Installation, Equipment Type, and Equipment Function, respectively. The letters following the AN designation numbers provide added information about equipment. Suffixes (A, B, C, etc.) indicate a modification. The letter (V) indicates that variable configurations are available. The letter (X) indicates a development status. A parenthesis () without a number within it indicates a generic system that has not yet received a formal designation, e.g., AN/ALQ(). Quite often the () is pronounced "bow legs" since they look like the shape of cowboy legs.

(1)	(2)	(3)	(4)	-	(5)	(6)	(7)
JETDS System	Platform Installation	Equipment Type	Function or Purpose		AN Model Number	Modification Letter	Special Changes

AN/	A	R	C	-	51	B	X
Army / Navy	Piloted Aircraft	Radio	Communications		51 st Model	2nd Modification	Change in Voltage

AN/	A	R	C	-	186		(V)
Army / Navy	Piloted Aircraft	Radio	Communications		186 th Model		Variable Configurations available

AN/	A	P	X	-	72		
Army / Navy	Piloted Aircraft	Radar	Identification and Recognition		72 nd Model		



C. DESIGNATION SYSTEM FOR ELECTRONIC EQUIPMENT
(2) PLATFORM INSTALLATION

Letter	Title
A	Piloted Aircraft
B	Underwater Mobile (Submarine)
C	Cryptographic Equipment (NSA use only, was Air Transportable)
D	Pilotless Carrier (Drone, UAV)
F	Fixed Ground
G	General Ground Use
K	Amphibious
M	Ground Mobile
P	Human Portable
S	Water (Surface Ship)
T	Transportable (Ground)
U	General Utility (Multi Use)
V	Vehicle (Ground)
W	Water Surface and Underwater combined
Z	Piloted/Pilotless Airborne vehicles combined

C. DESIGNATION SYSTEM FOR ELECTRONIC EQUIPMENT

(3) EQUIPMENT TYPE

Letter	Title
A	Invisible Light, Heat Radiation (e.g. infrared)
B	Comsec (NSA use only) (was Pigeon)
C	Carrier (electronic wave or signal)
D	Radiac (Radioactivity Detection, Identification, and Computation)
E	Laser (was NUPAC, Nuclear Protection & Control)
F	Fiber Optics (was Photographic)
G	Telegraph or Teletype
I	Interphone and Public Address
J	Electromechanical or inertial wire covered
K	Telemetry
L	Countermeasures
M	Meteorological
N	Sound in Air
P	Radar
Q	Sonar and Underwater Sound
R	Radio
S	Special or Combination
T	Telephone (Wire)
V	Visual, Visible Light
W	Armament (not otherwise covered)
X	Fax or Television
Y	Data Processing
Z	Communications (NSA use only)

C. DESIGNATION SYSTEM FOR ELECTRONIC EQUIPMENT

(4) FUNCTION OR PURPOSE

Letter	Title
A	Auxiliary Assembly
B	Bombing
C	Communications (two way)
D	Direction Finding, Reconnaissance and Surveillance
E	Ejection and/or Release
G	Fire Control or Searchlight Directing
H	Recording and/or Reproducing
K	Computing
L	No longer used. Was Searchlight Control, now covered by "G".
M	Maintenance or Test
N	Navigation Aid
P	No longer used. Was Reproducing, now covered by "H"
Q	Special or Combination
R	Receiving or Passive Detecting
S	Detecting, Range and Bearing, Search
T	Transmitting
W	Automatic Flight or Remote Control
X	Identification or Recognition
Y	Surveillance (target detecting and tracking) and Control (fire control and/or air control)
Z	Secure (NSA use only)

C. DESIGNATION SYSTEM FOR ELECTRONIC EQUIPMENT**(5) MODEL NUMBER**

Following the three-letter designation, after a dash, is a number, uniquely identifying the equipment.

C. DESIGNATION SYSTEM FOR ELECTRONIC EQUIPMENT**(6) MODIFICATION LETTER**

Different variants of the same equipment may be given an additional letter and other suffixes (for example, AN/SPY-1A, AN/SPY-1B, etc.), while entirely new equipment within the same category is given a new number (for example, AN/SPY-3).

C. DESIGNATION SYSTEM FOR ELECTRONIC EQUIPMENT

(7) SPECIAL CHANGES

Letter	Title
T	Training System
(V)	Variable Systems available
X	Changes in Voltage
Y	Changes in Phase
Z	Changes in Frequency

**C. DESIGNATION SYSTEM FOR ELECTRONIC EQUIPMENT
SUBSYSTEMS**

Subsystems ("groups") are designated by a two letter code (without the AN/ prefix), followed by a number, followed by slash and one, two or three letters from the three letter codes for systems. For example, BA-1234/PRC would be a battery for portable radio sets.