

FSX Douglas C-47 Skytrain V2

This is a re-worked version of our 2011 FSX C-47 Skytrain. The new models feature a modern VC, a realistic slow radial engine start, a paratrooper/cargo drop door, a Control Panel, a fuel and payload manager, failure conditions, improved engine textures, and new cameraviews focusing on props and engines. Sound is aliased to the default DC-3. Three Expansion Packs will become available separately from Sim-Outhouse, including a custom sound set by Ted "Tufun" Wolfgang, and a paintkit and two weathered VC texture sets by Gordon "Gman" Madison. Earlier paints need to be adjusted to catch the new nose and engine mappings (conversion kit included in this basepack). Models by Manfred Jahn, flight dynamics by Alexander M. Metzger, gauges, animations, and failure conditions by Hansjoerg Naegle. Startup smoke effect by Ted Wolfgang.

Minimum system-requirements: FSX SP2. Recommended: FSX Gold Edition or Acceleration.

INSTALLATION

- (1) Extract the zip to a temporary folder or open it in Windows Explorer.
- (2) You should see three subfolders: Effects, Simobjects, and Sound. Copy these three folders directly to your main "Flight Simulator X" folder using "merge" or "integrate folders" mode when asked (do NOT use "replace"). Should you have any misgivings about this procedure play it safe, enter the source subfolders individually and copy the files to the appropriate FSX destination folders.
- (3) Users of a currently installed C-47 by M. Jahn should move the old folder "Douglas_C-47" to a safe backup location **outside** FSX. Then, if you want to use previously downloaded paints, copy the [fltsim] sections you want over to the new FSX folder ("Douglas_C-47_V2"). Remember to edit the copied [fltsim] sections, giving them their appropriate number in sequence and referencing the new sim, kb_checklist and kb_reference values. Additionally, as mentioned above, old paints need a bit of editing for the nose and the props to show up correctly.
- (4) In the Flight Simulator's aircraft selection menu, the single aircraft provided will show up as "Douglas C-47R Skytrain EATS 315221". I am using the 'R' to stand for Reloaded or V2.



Douglas C-47R Skytrain
EATS 315221

SIM-OUTHOUSE C-47 EXPANSION PACKS

In order to use Sim-Outhouse's Add-Ons Library you have to be registered as a member. Membership is free at <http://www.sim-outhouse.com>

- (1) For Ted "Tufun" Wolfgang's sound pack download "TW Radial Twin Sound Package.zip" and follow the instructions in the Readme.

Another excellent sound set has been created by Adam Murphy of Skyhigh Flight Simulations at <http://skyhighflightsim.webs.com>

(2) For Gordon "Gman" Madison's alternate VC texture sets download VCtextures_C47.zip and follow the instructions given in the Readme.

(3) For Gordon's paintkit download the package Paintkit_C47.zip and follow the instructions given in the Readme.

FSX OPERATION NOTES

(1) Fly this aircraft according to its checklist, which is accessible in two different formats, one via Shift-F10 and the other via a click on the pilot's clipboard. The Shift-F10 checklist has FSX-specific tips and is suitable for beginners; the pilot's clipboard version has no FSX tips and is suitable for more experienced users.

(1) **Control Panel.** While this model has no 2D panel, you can activate a two-page Control Panel popup via Shift-2 (page 1) and Shift-3 (page 2). The default size of these pages have been adjusted for 16:9 monitors. If the pages appear squashed you can temporarily drag their edges for better display. Alternatively, use Notepad to edit the panel.cfg, which allows pre-defined settings for 4:3 and 16:10 ratio screens to be used.

Page 1 has a payload and fuel manager (aircraft needs to be on ground with parking brakes set for it to work). Select Total Payload and Total Fuel options "EMPTY" to put the aircraft into a "cold and dark" state.

Page 2 presents a tabular display of all major settings and readouts including failure warnings and context-sensitive tips. **We suggest keeping page 2 of the Control panel open and monitoring the various readouts, warnings, and tips (hover the mouse pointer over the item in question for options) until you have become thoroughly familiar with the Do's and Don'ts of handling this plane.**

(2) **Failure conditions.** The main failure conditions (which are partly dependent on FSX's Realism Settings) are battery depletion and engine failure, both of which can happen fairly quickly. The battery can be replenished by middle-clicking the battery item on page 2 of the Control panel, or (when on ground with parking brakes SET) by flipping the Ground Power switch on the overhead panel (FSXA only). Engine stress is signaled on page 2 of the Control Panel by a numeric counter decrementing from 100% to 0, with the final red zero flagging impending failure. Engine stress can only be cured by reducing MAP and RPM to the acceptable 'green' ranges indicated on the respective gauges.

(3) Control Panel settings and VC switches usually act on both left and right clicks, the mouse wheel, and occasionally also middle clicks. Side windows, pilot's yoke, overhead spotlights, call sign, wipers, and pilot's clipboard are also clickable - click them and see what they do.

(4) **Engine Start.** You can choose one of four startup procedures. (i) Ctrl-E will work in many situations, but it will not produce the realistic slow period-style engine start we all want. (ii)

For a slow engine start, open page 2 of the Control Panel and go through the eight steps detailed in the mini-tutorial engstart.jpg or in the PDF version of this Readme. (iii) Use the relevant switches of the Engine Start section on the VC's overhead panel (mid-click the Starter button for best results). (iv) Use the mini-icons accessible via Shift-7 in any view, including spot.

Note, proper engine start sequence is 2 - 1.

Flight: **NAVY**
17191

batt	ext	amp	radio	nav	land	pnl
24.0	0.0	30	24.0	OFF	OFF	OFF
door1	vac	wiper	static	deice	p-ice	stby1
CLSD	OFF	OFF	OFF	OFF	OFF	OFF
#1	carb	mags	qer	pump	prime	start
#2	OFF	OFF	0.0	ON	OFF	OFF
#1	LM	602	30	18	0.085	AR
#2	RM	602	30	18	0.085	AR
#1	0	29.9"	0	38	100%	10%
#2	0	29.9"	0	46	100%	10%
psi	hand	tail	park	left	right	flaps
0	OFF	FREE	100%	DN	DN	UP
pitot	oat	ktas	kias	alt	vsi	hdq
OFF	+15°	0	0	16	+0	313°
suc	aoa	pitch	trim	target	fpm	lock
0.0	+0.0°	20°	+0.0°	0	+0	360°

17:27:11 -2-

Engine Start Procedure

← Shift-3: open Cotrol Panel, page 2.

1 Battery

2 Mixture

3 Throttle

4 Prop Control

5 Fuel Pump

6 Starter Button

7 Mags / Ignition

8 Prime

24V (mid-click to reset)

AUTO RICH
(R-click on "mix" for AR; mid-click for manual)

CRACKED (10%)

FULL FORWARD

ON

mid-click and count NINE BLADES
(Hover mouse over "start" settings for tips and error tracking)

R-click until BOTH
IF REQUIRED

Note
In case of "carb flooding" turn off pumps, open throttle a few seconds, close throttle, and redo steps 1-8. Alternatively, use Ctrl-E to recover.

- (5) In the VC, propeller control, throttle, and mixture levers can be linked by middle-clicking any one of them. To unlink, middle-click again.
- (6) Cowl flaps open/close in intervals by clicking the "cht" (cylinder head temperature) item on the Control Panel or on pressing Shift-Ctrl-V / Shift-Ctrl-C. The recommended settings are listed in the checklist.
- (7) The angle of the landing lights cones on the runway can be changed by pressing Shift-Ctrl-Num8/Num2 respectively.

- (8) The port passenger/freight door can be opened/closed by pressing Shift-E. The second freight door opens on Shift-E-2. Steps appear on Shift-E-3 (parking brake needs to be set). Paratrooper door opens/closes via Shift-E-4.
- (9) Flip battery switch OFF and apply parking brakes to display wheel chocks and let the pilots take a break.
- (10) For detailed instructions on how to operate the Garmins consult the docs in subfolder "Documentation". When operating the Garmins, use left/right clicks on ON/OFF knob to decrease/increase the brightness of the display. Similarly, use left/right clicks to scroll through multiple pages. Generally, right=next and left=previous. For the NAV/GPS link switch click the CDI button on the Garmin.

CREDITS

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