

ASOS RESEARCH BRIEF

Research Request:

Do you have any research info on aircraft being taxied into a hangar under their own power instead of using a tug?

Research Response:

Taxiing an aircraft into or out of a hangar under its own power is not a recommended practice. There are several hazards associated with this procedure and that is why utilizing a tug to tow the aircraft is the best practice. Additionally, many major and smaller airports strictly forbid aircraft to taxi under their own power into or out of a hangar. In consulting with a few pilots, they reported it was extremely rare to see any aircraft taxi into a hangar on its own power. Listed below are several considerations for this operation and a few examples of the taxi procedures for various airports.

Hazards

- Foreign objects may be ingested into the intake of the engine.
- Debris may be blown around in the hangar, causing damage.
- It creates an unnecessary hazard for employees in the hangar.
- There is an increased level of noise.
- Dust and debris may be blown in the eyes of employees.
- Extra power may be applied inadvertently, such as attempting to go over the lip at the hangar entrance.
- Noxious fumes may be created in the hangar.
- If there is no ground marshal, the aircraft could be damaged.
- It is difficult to predictably maintain a safe, controlled, and slow speed while entering or exiting the hangar.
- If there is snow/ice, there is less control over the aircraft. There are many ASRS
 reports of aircraft skidding while approaching a hangar or gate.

Airports

Denver International Airport, CO. Largest Runway- 16,000ft

.06-3 Aircraft shall be taxied at all times at a slow and reasonable speed and in a safe manner, under control of the pilot thereof. Pilots shall taxi at their own discretion in accordance with these rules in areas not visible from the Ramp Control Tower or FAA Control Tower. No aircraft shall be taxied into or out of any hangar.

.06-4 Aircraft shall not be positioned, started or taxied so that propeller slipstream or jet engine exhaust blast may cause injury to persons or do damage to property or where it may generate turbulence across taxiways or runways so as to endanger the safety of operations in the above areas. If it is impossible to taxi such aircraft without compliance with the above, then the engine(s) must be shut off and the aircraft towed.

Riverside Municipal Airport, CA. Largest Runway- 5,400ft.

Section 12.08.240 Taxiing into or out of hangar--Operating engines in hangar. **No aircraft shall be taxied into or out of the hangar at the airport.** Aircraft being taxied and scheduled for servicing in hangar shall be halted a safe distance from the hangar doors and the engine stopped. Approved power-operated industrial trucks may be used to move aircraft into, about and out of hangars. Aircraft engines shall not be operated within hangars, but may be electrically turned over during servicing operations. (Ord. 5661 § 1, 1988; prior code § 5.11 (part))

Napa county airport, CA. Largest Runway- 5,931ft.

11.28.220 Aircraft--Taxiing restrictions.

No person shall taxi any aircraft into, out of or within any hangar or other building on or adjacent to the airport; nor shall any person move any aircraft under its own power on the airport unless he is in full control of such aircraft, and has assured himself that there is no danger of collision with other aircraft, vehicles, equipment, buildings or other obstacles. Aircraft shall be taxied at a safe speed, not to exceed fifteen miles per hour. (Ord. 628 § 1 (part), 1980: prior code § 8990.19)

Chickasha Municipal Airport, OK. Largest Runway– 5,100ft.

Taxing aircraft.

- (a) No person shall taxi an aircraft until he has ascertained there will be no danger of collision with any person or object in the immediate area.
- (b) Aircraft will be taxied at a safe and prudent speed, and in such manner as to be at all times under the control of the pilot.
- (c) Aircraft not equipped with brakes will not be taxied near buildings or parked aircraft unless an attendant is at a wing of the aircraft to assist the pilot.
- (d) Aircraft shall not taxi onto the runway if there is an aircraft approaching to land, or on the ground in take-off position.
- (e) There shall be no taxiing of aircraft by engine power into or out of hangars.