

WINDSHIELD WIPER & WASHING SYSTEM – LCH

1. INTRODUCTION

The Windshield Wiper and Washing System (WWWS) is designed to remove rainwater and dust to obtain an adequate zone of vision on the Helicopter windshield. The system can be operated during take-off, on landing or during flight. The system will be associated with a washing system that is designed to spray the windshield with washing fluid from tank by means of a pump to obtain clear visibility through pilot windshield in the wiped area under dusty/desert environment.

The Windshield wiper system for LCH will consist of an electrical motor that operates a wiper head (converter). The wiper head will convert the rotary motion from the wiper motor to an angular motion which will be transferred to the wiper blade by drive arm. The washing system will be fitted to enable flights in dusty/desert environments.

2. TECHNICAL DETAILS OF WIPER SYSTEM

i.	Wiping angle	Slow speed: $35^{\circ} +3^{\circ}/-2^{\circ}$ Fast speed: $35^{\circ} +3^{\circ}/-2^{\circ}$
ii.	Park angle	$0 \pm 1^{\circ}$
iii.	Wiping speed	Slow speed: 50 cycles/minute \pm 10 cycles Fast speed: 70 cycles/minute \pm 10 cycles
iv.	Wiper blade pressure on windshield	25 ± 3 N
v.	Windshield sweeping area	Pilot & Co-Pilot windshield: 0.398 m ² (approx.)
vi.	Operation with wind speed	The system will be capable of operating at airspeed of 285 km/h.