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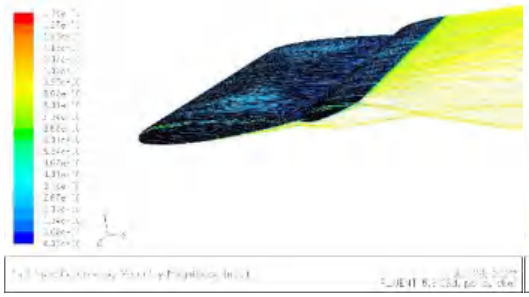
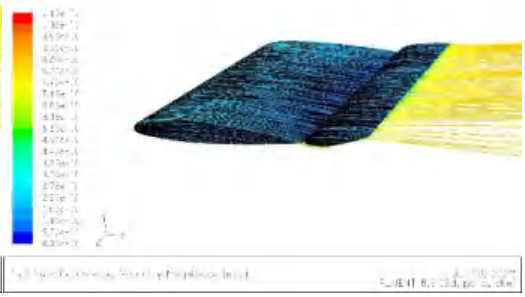
Lampiran 1 Karakteristik aliran

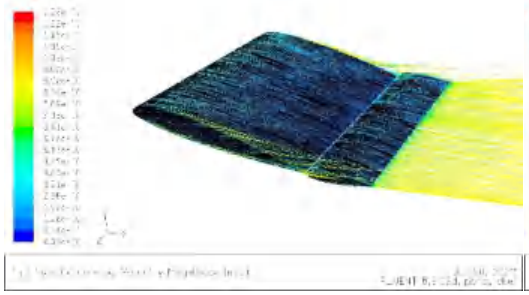
1. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = -10˚ dan δ_k = -10˚



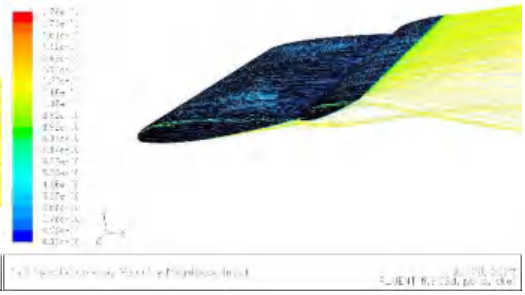
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



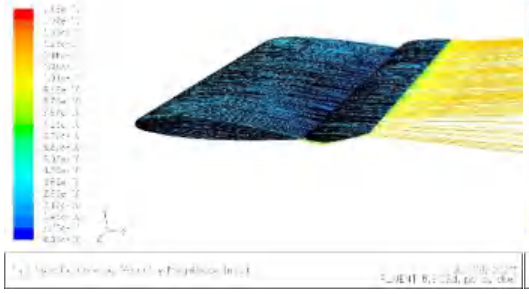
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



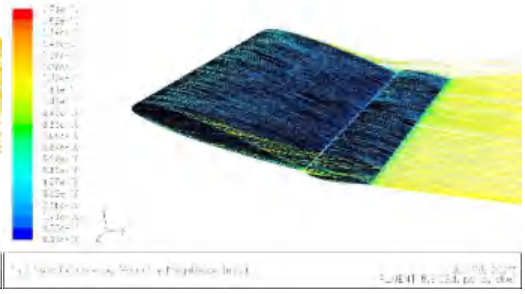
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

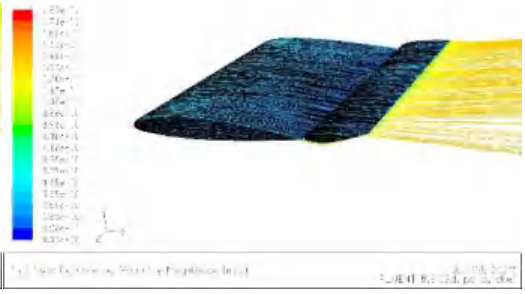


Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

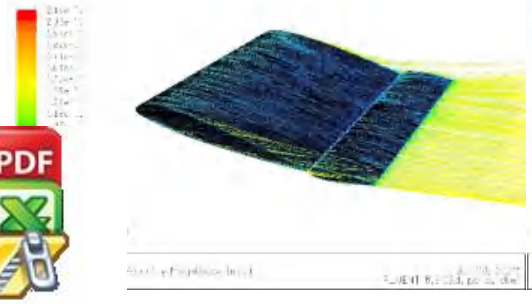


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

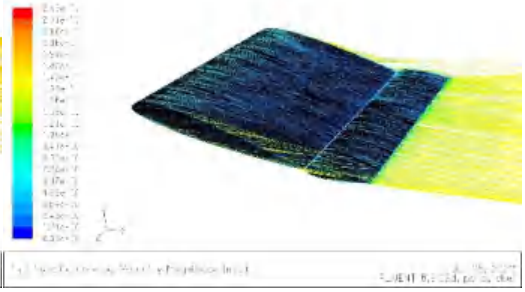


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

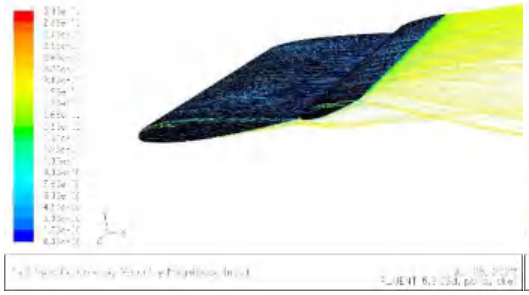


Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

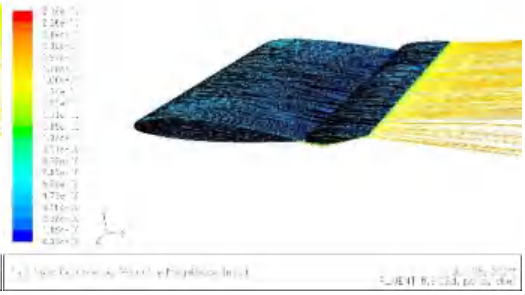
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



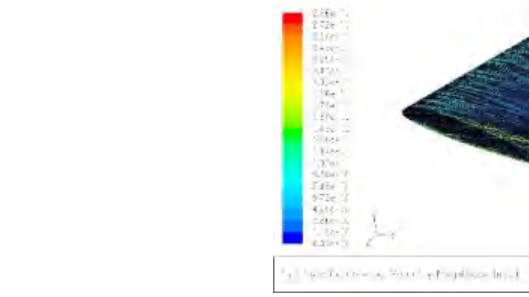
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



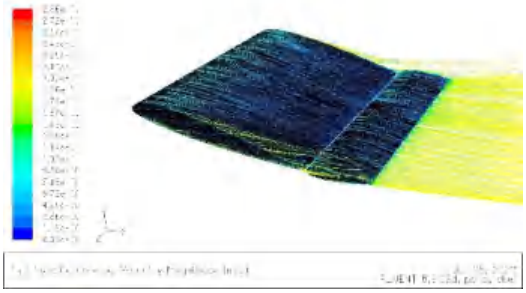
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s



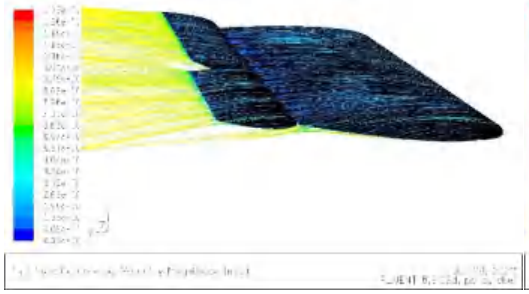
Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

2. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = -10˚ dan δ_k = 0˚

Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

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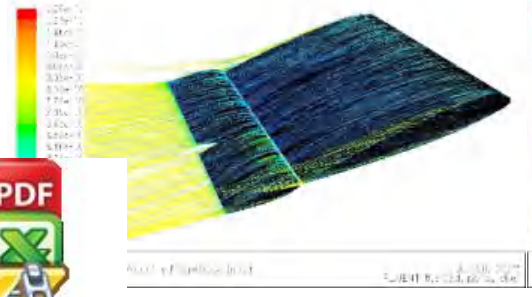

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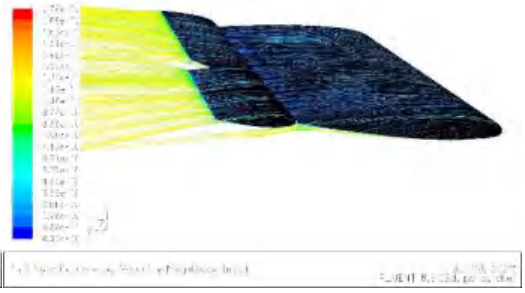

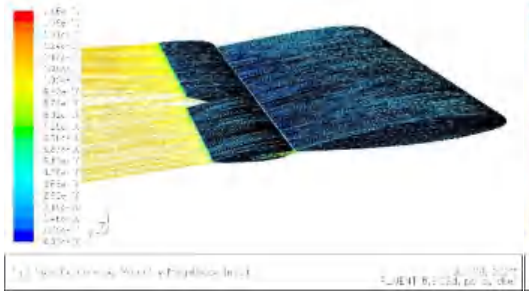

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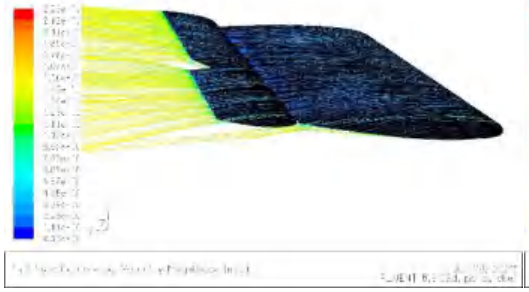
Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s



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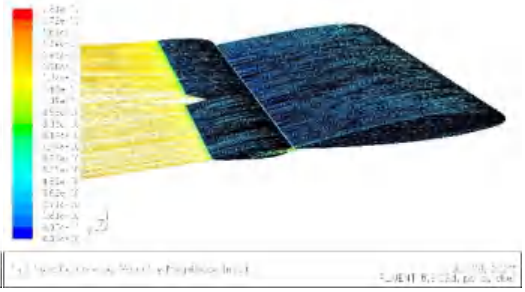
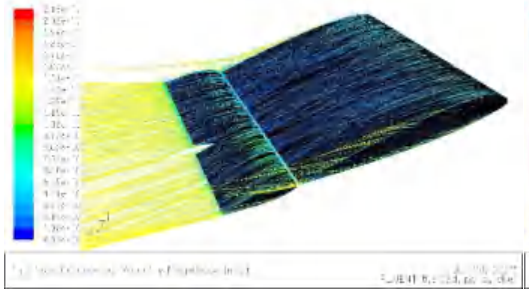
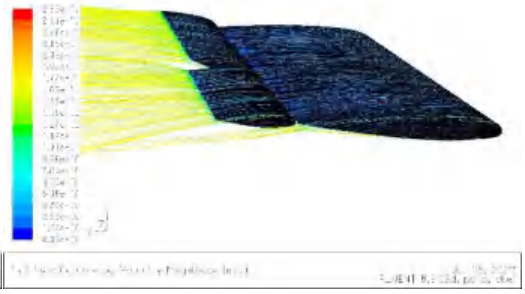


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



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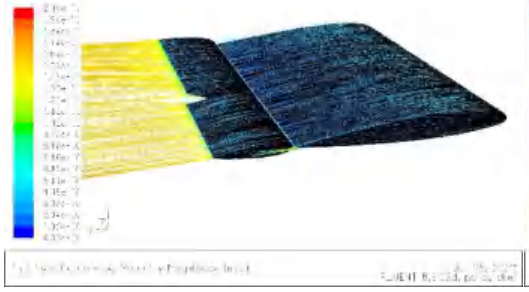
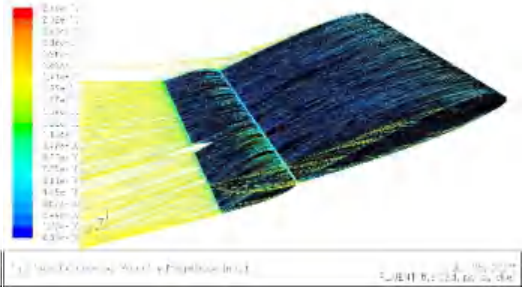
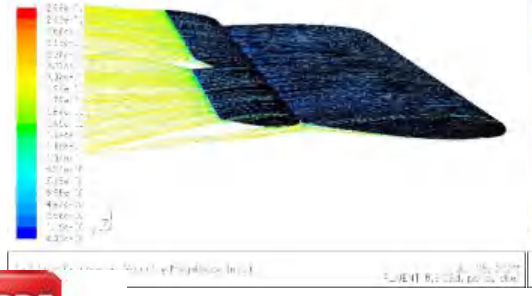


Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



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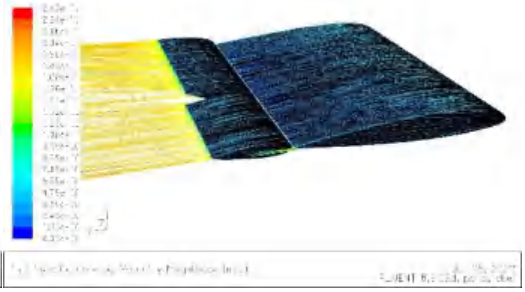


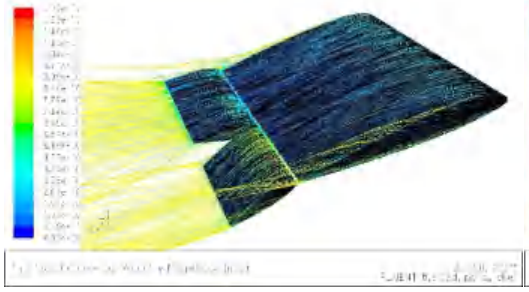
Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

3. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = -10˚ dan δ_k = 15˚

Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s

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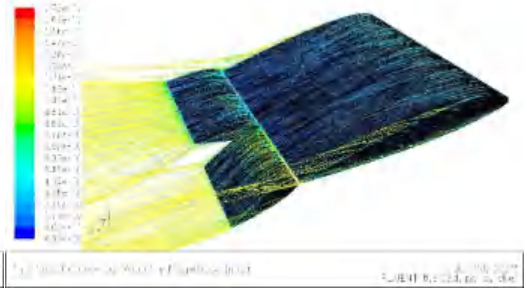
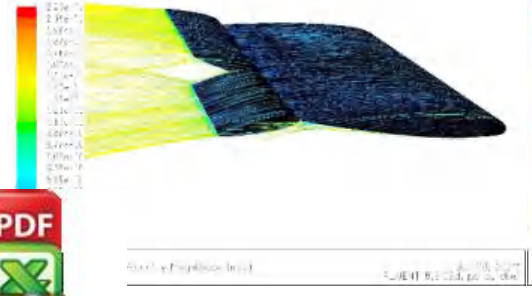
Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

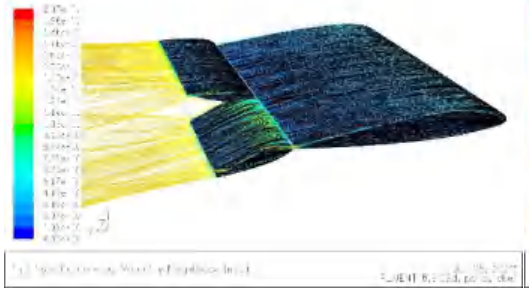


ıg *airfoil* (α = -10˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



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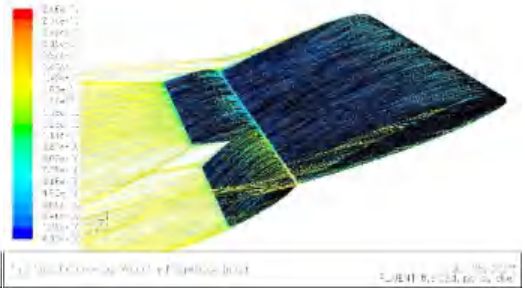
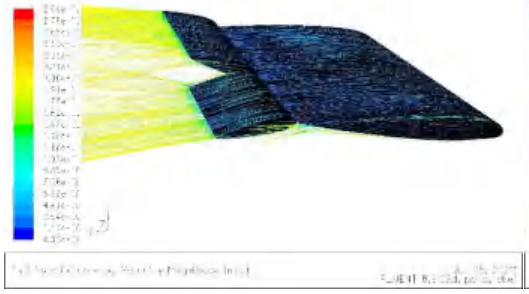
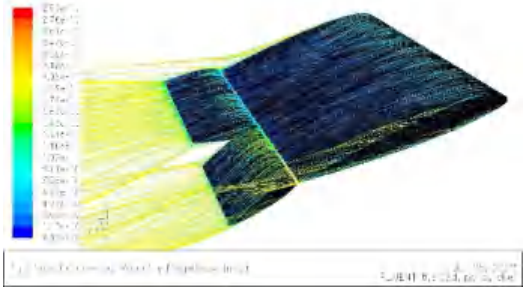


Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

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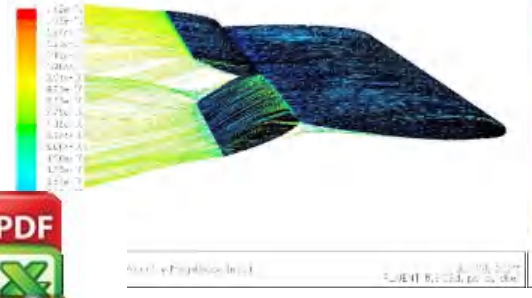
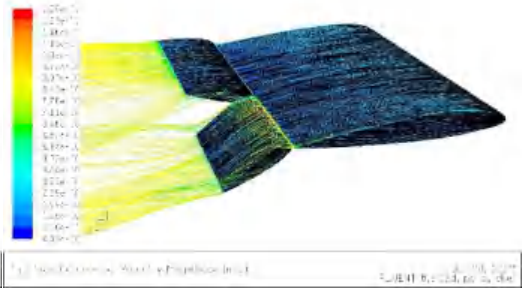


ıg *airfoil* (α = -10˚) dan U_0 = 9 m/s



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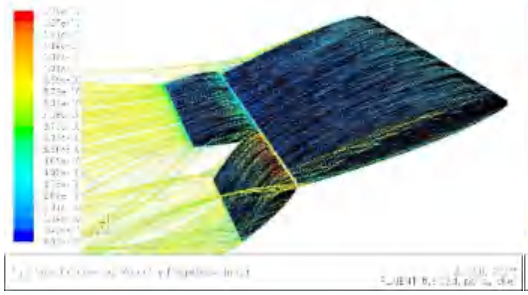

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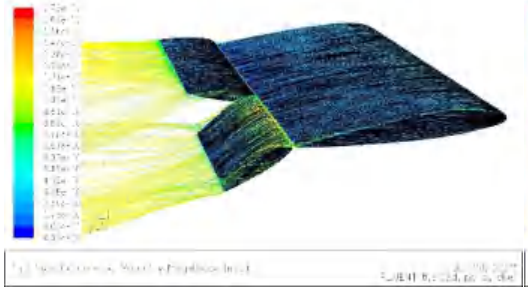
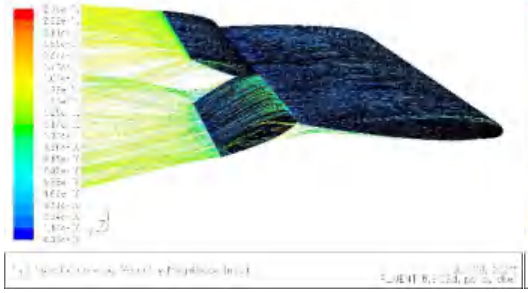
Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s



Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

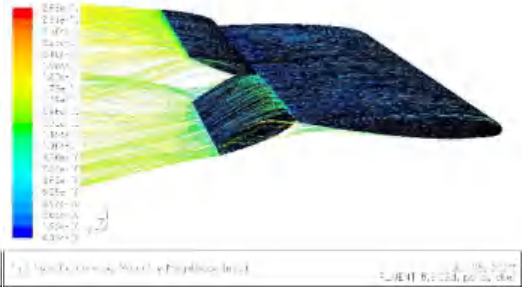
Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

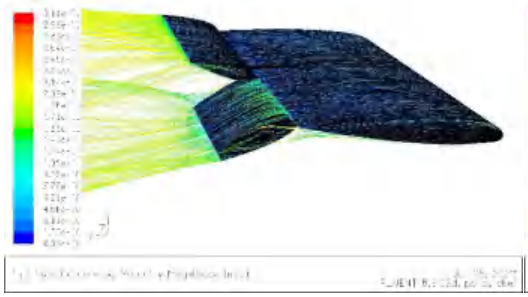
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



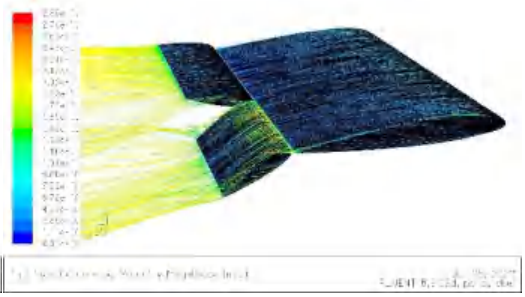
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s

ıg *airfoil* (α = 0˚) dan U_0 = 17 m/s

Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



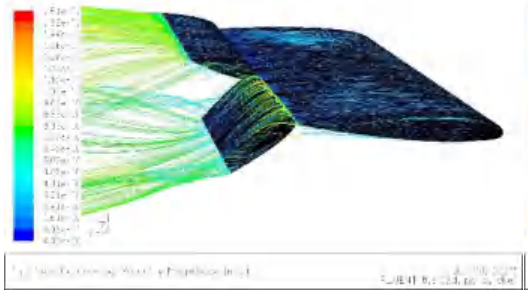
Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s



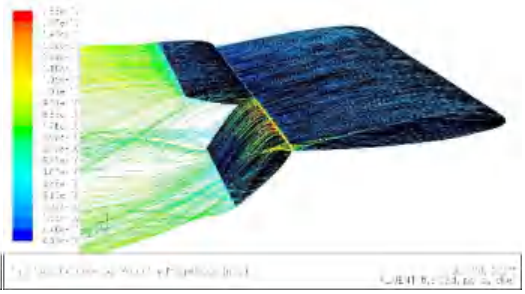
Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

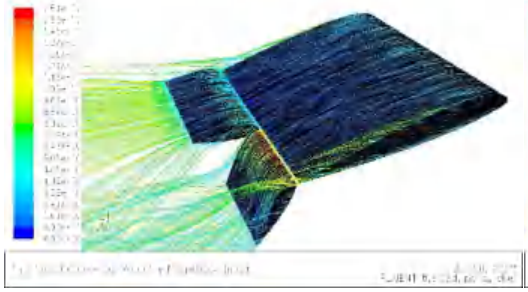
5. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = -10˚ dan δ_k = 45˚



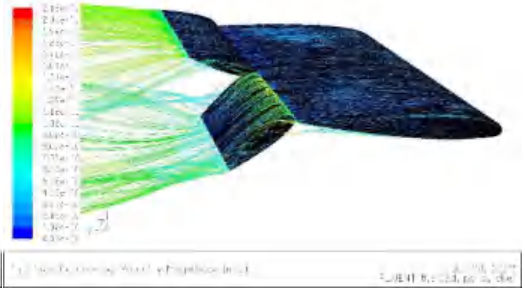
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



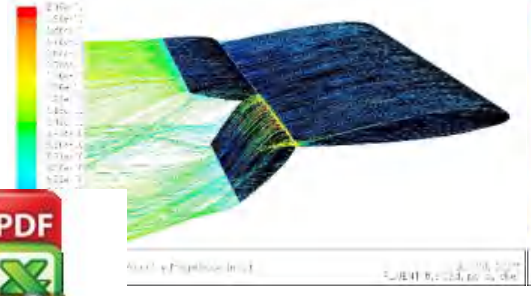
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



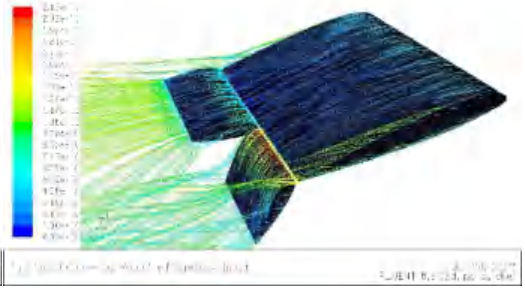
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

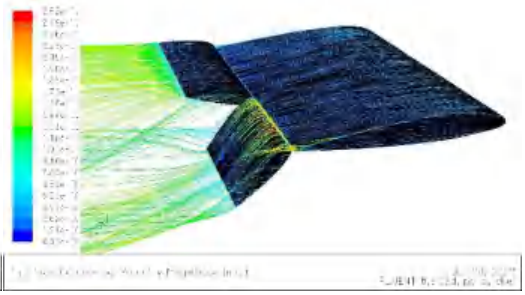


ıg *airfoil* (α = 0˚) dan U_0 = 12 m/s

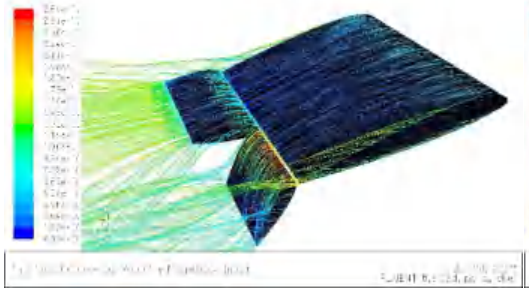


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

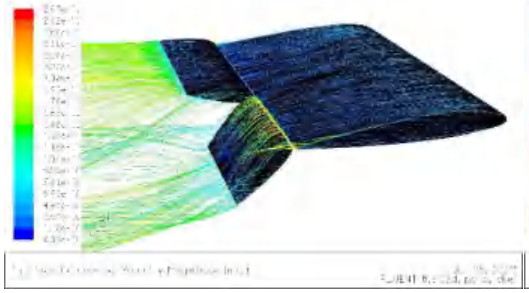


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

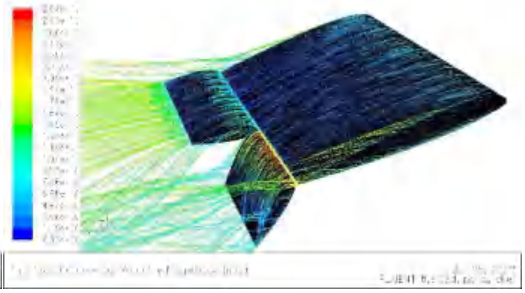


Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

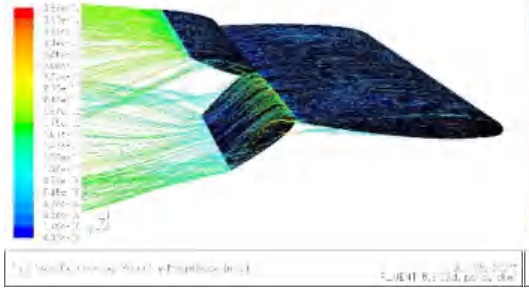
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



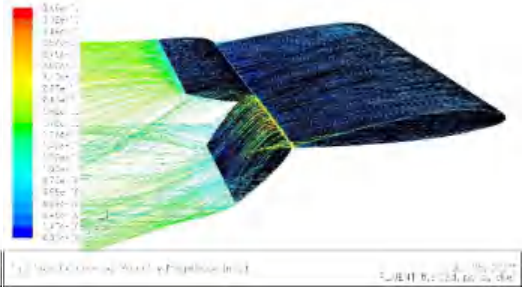
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



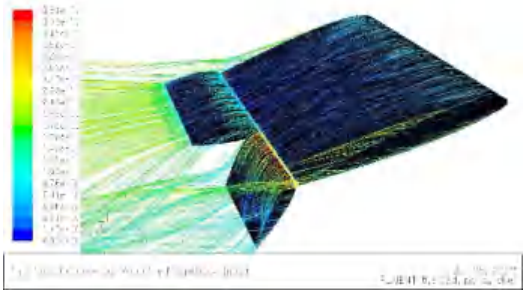
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s



Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

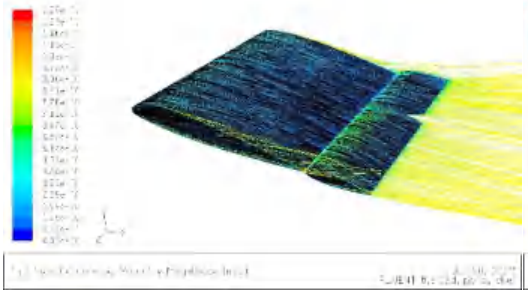


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

6. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada $\delta_u = 0^\circ$ dan $\delta_k = -10^\circ$

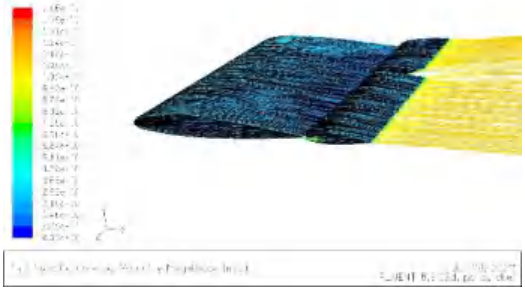
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

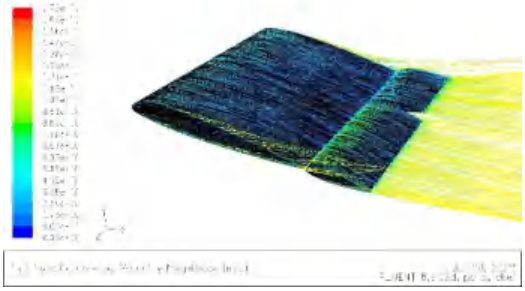


Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s

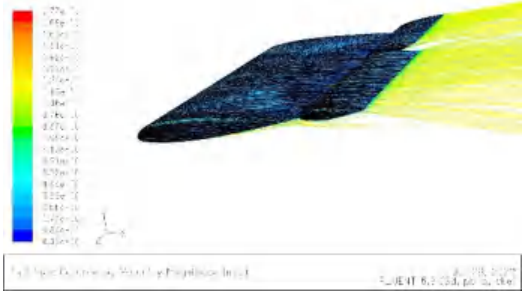
Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s



Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

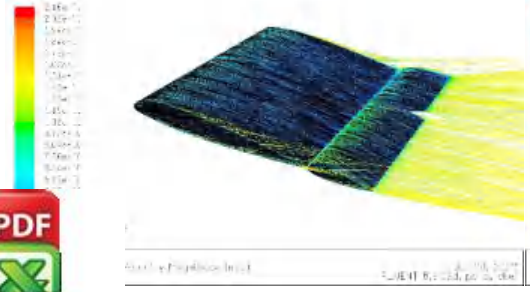


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

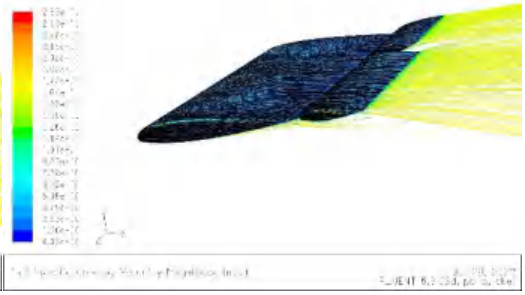


Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

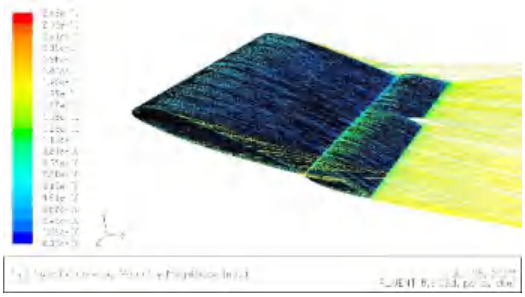


ıg *airfoil* (α = 15˚) dan U_0 = 15 m/s

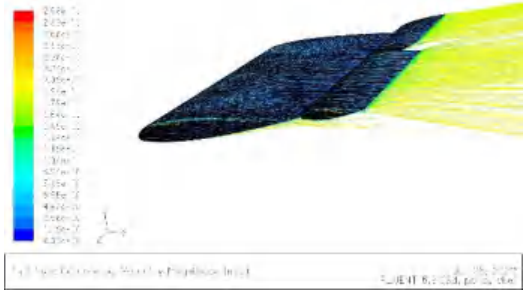


Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s

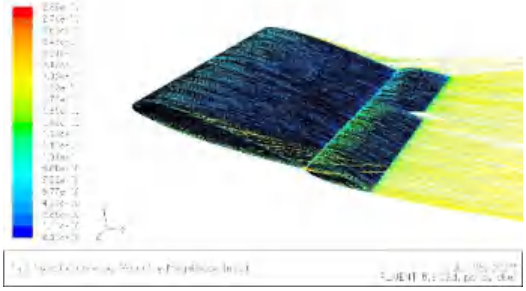


Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



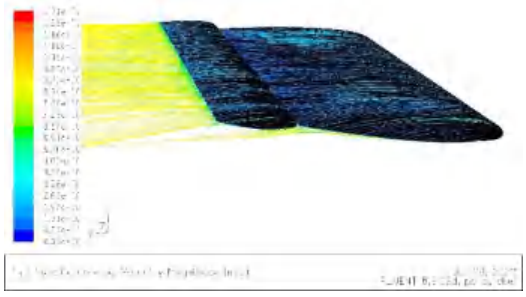
Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

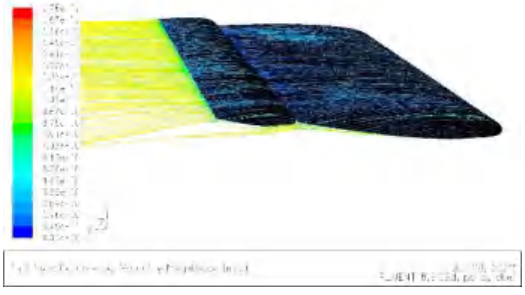
7. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada $\delta_u = 0^\circ$ dan $\delta_k = 0^\circ$



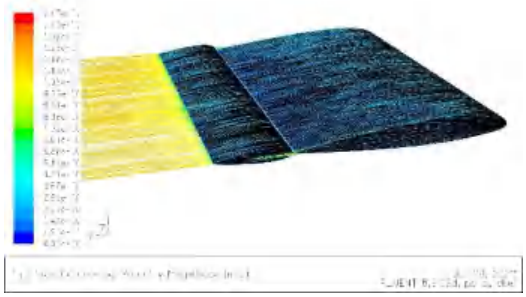
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

ıg *airfoil* (α = 15˚) dan U_0 = 9 m/s

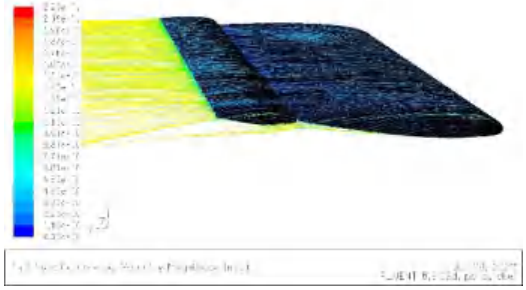


Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

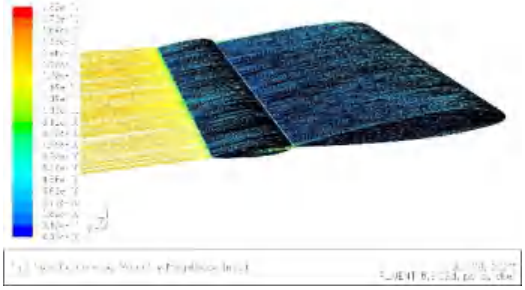


Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

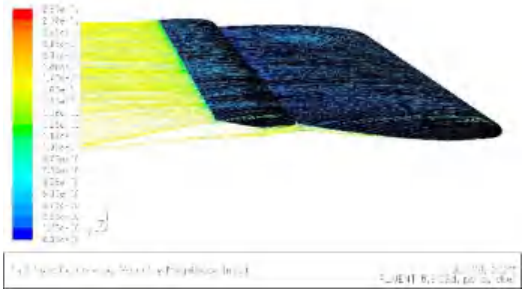


Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

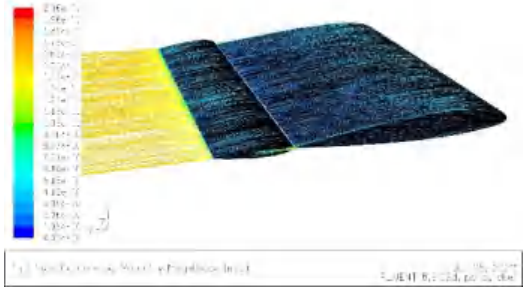


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

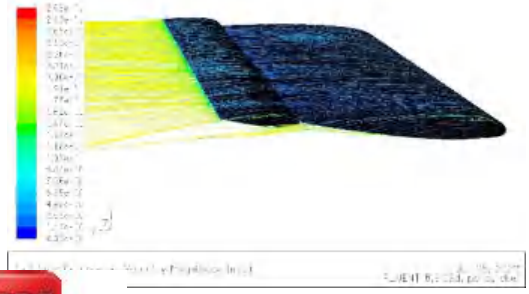


Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s

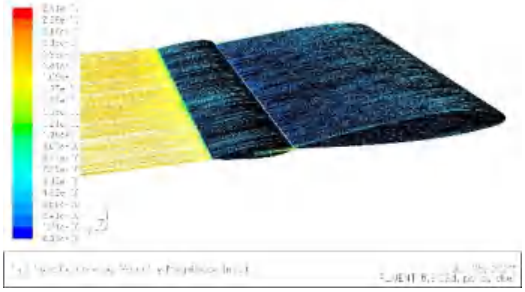


Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s

Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



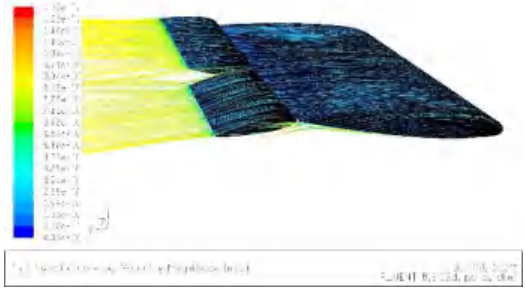
ıg *airfoil* (α = -10˚) dan U_0 = 20 m/s



Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

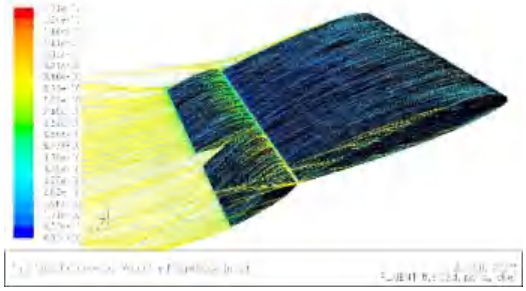
Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

8. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 0˚ dan δ_k = 15˚

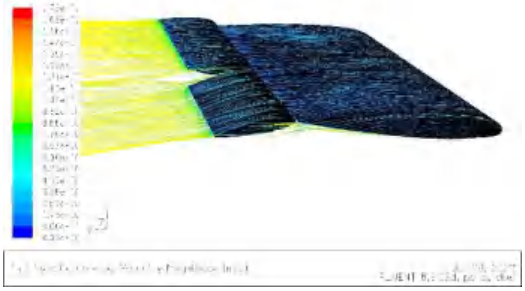


Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

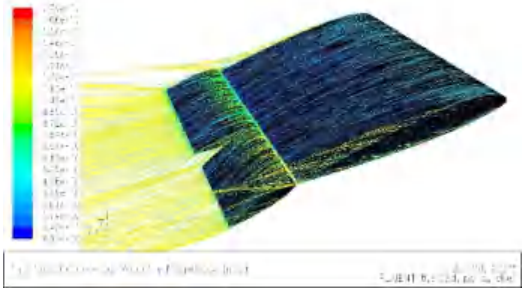


Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s

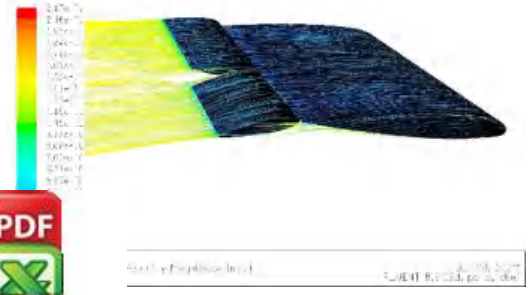


Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

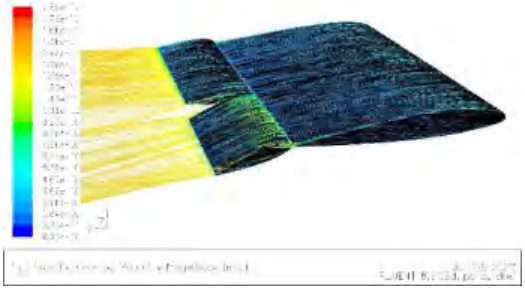
Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s



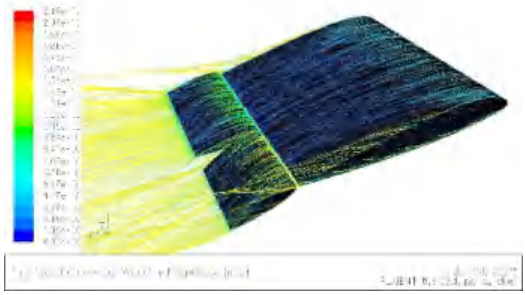
Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s



ıg *airfoil* (α = -10˚) dan U_0 = 15 m/s

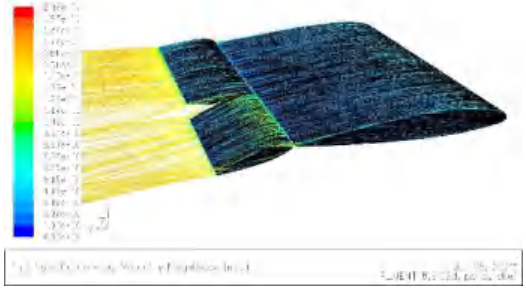


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

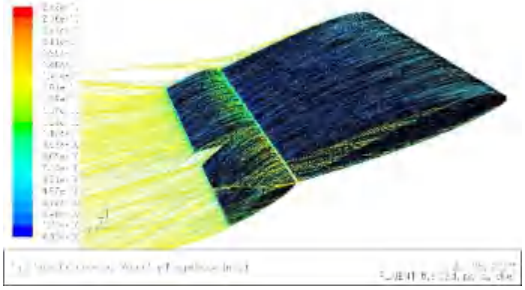


Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



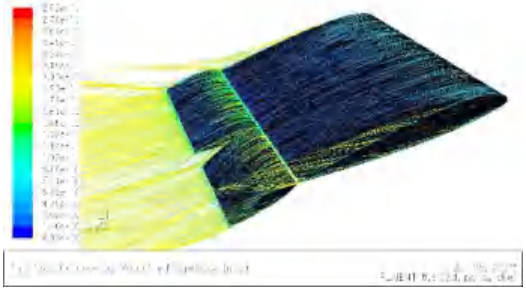
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s

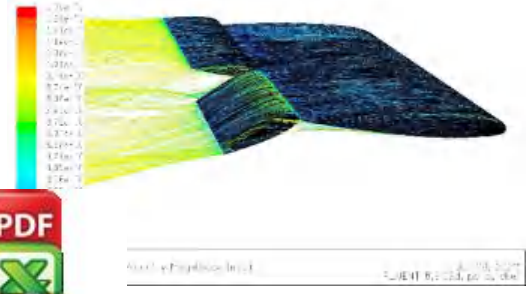
Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

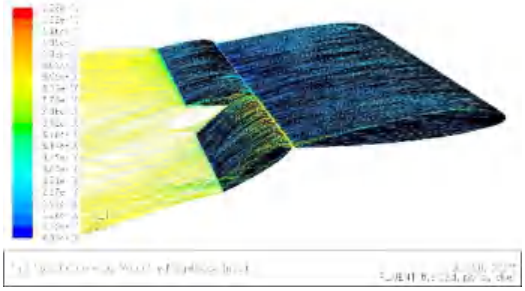


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

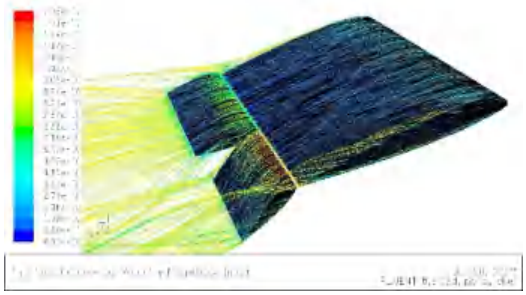
9. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada $\delta_u = 0^\circ$ dan $\delta_k = 30^\circ$



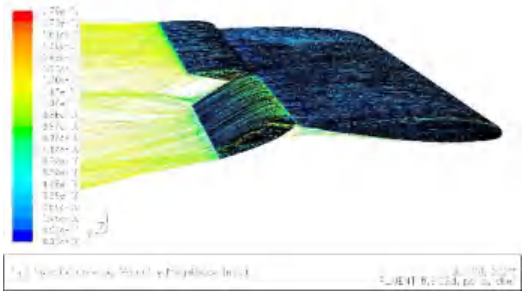
ıg *airfoil* (α = -10˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

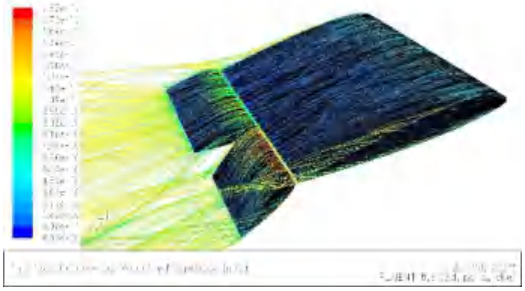


Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

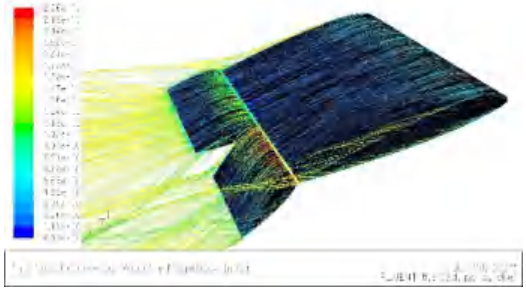
Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

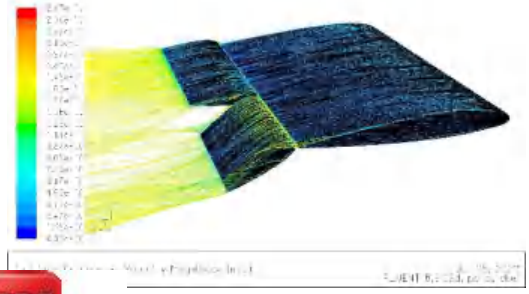
Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

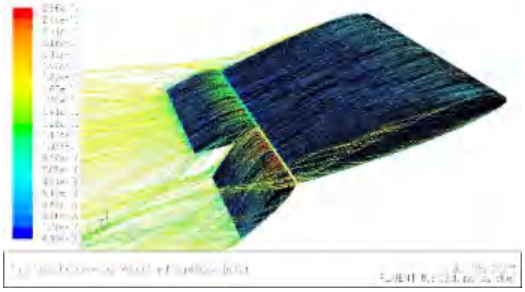


Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



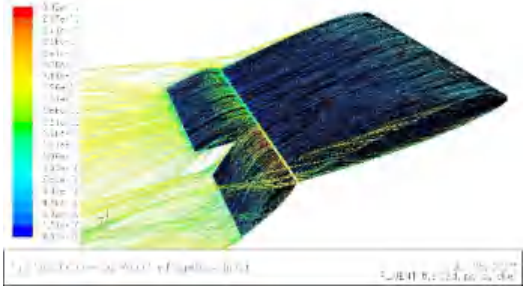
ıg *airfoil* (α = 0˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

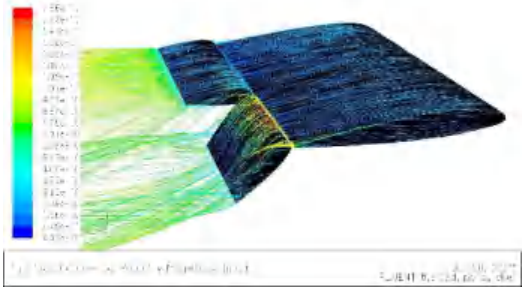
Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s



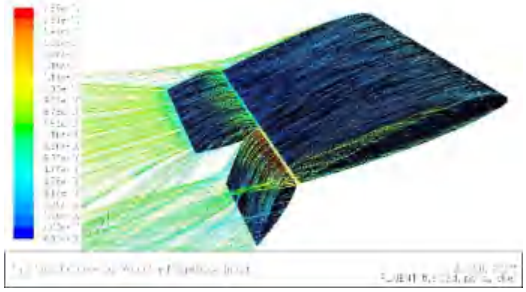
Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

10. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada $\delta_u = 0^\circ$ dan $\delta_k = 45^\circ$

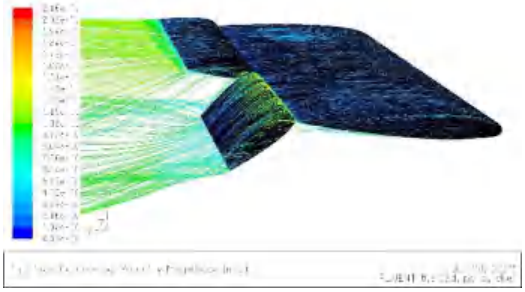
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



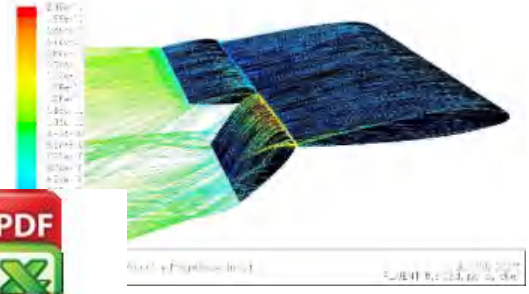
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



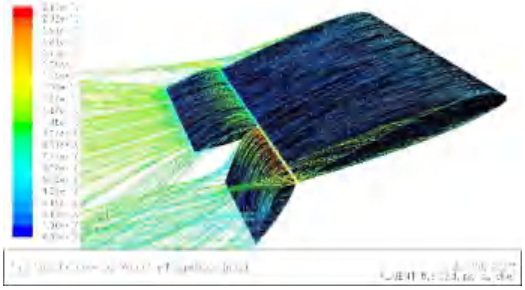
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

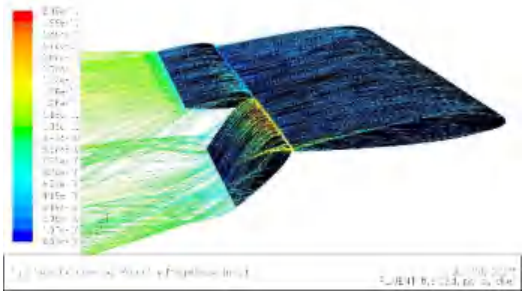


ıg *airfoil* (α = 0˚) dan U_0 = 12 m/s

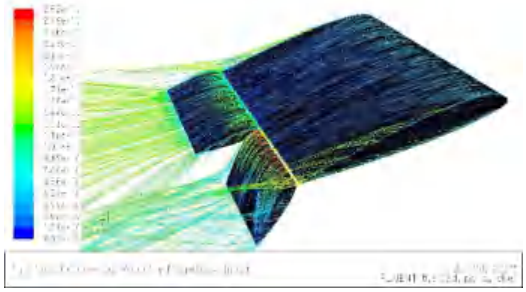


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

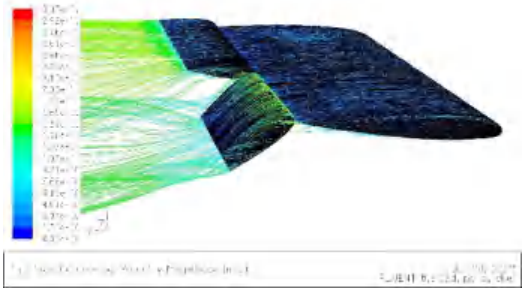
Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s



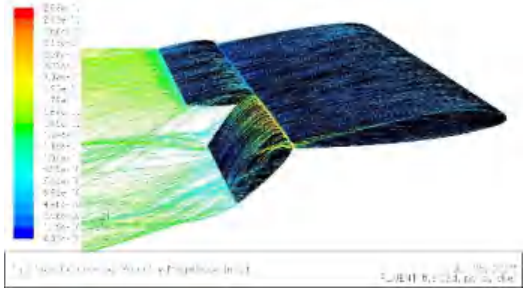
Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



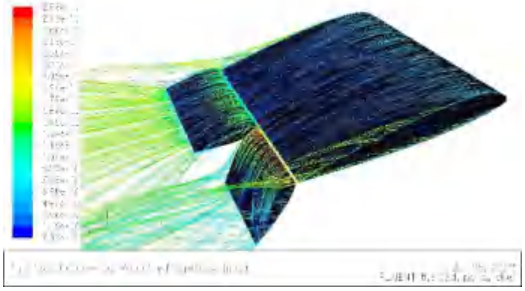
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s

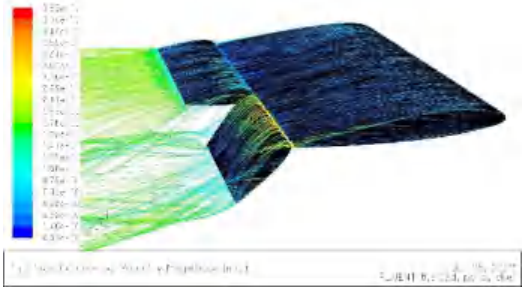


Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s

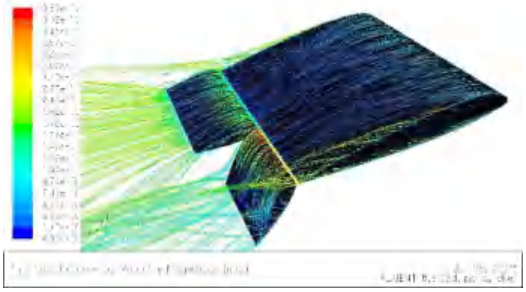


Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

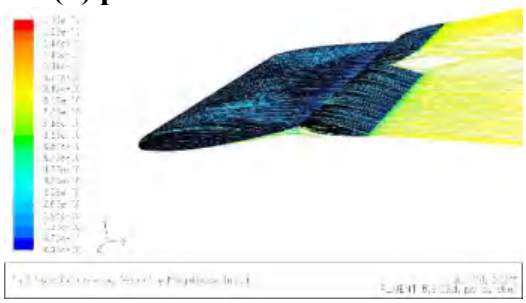


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

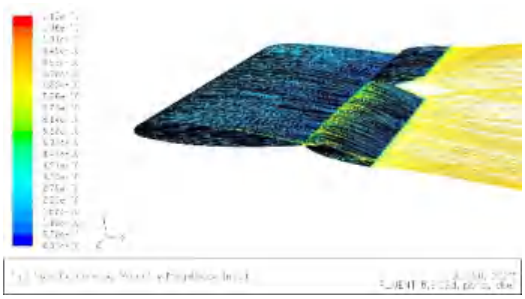


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

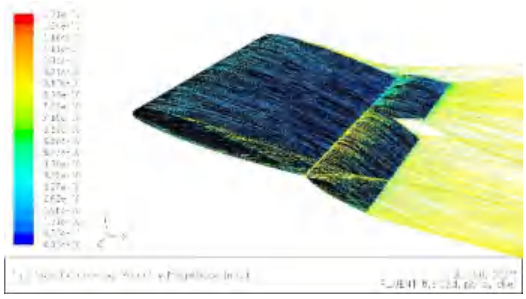
11. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada $\delta_u = 15^\circ$ dan $\delta_k = -10^\circ$



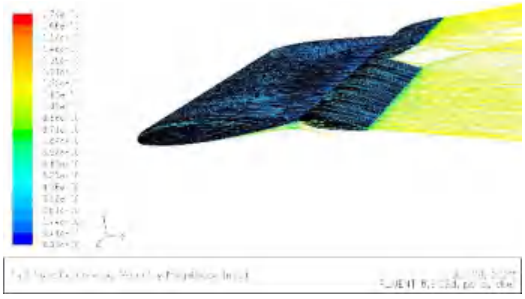
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



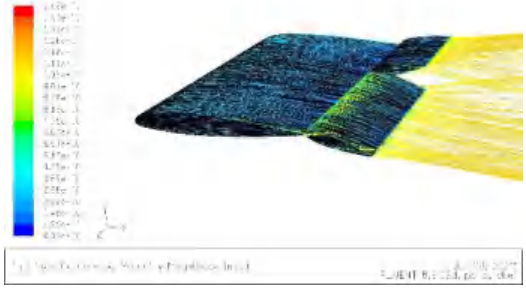
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



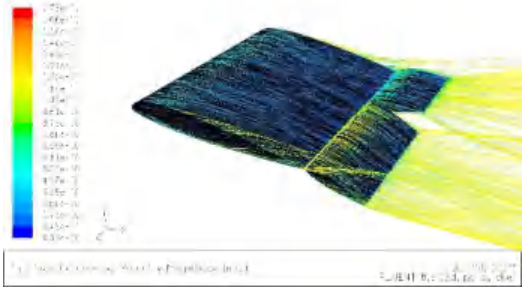
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

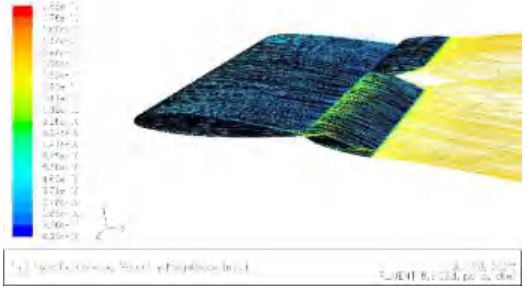


Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

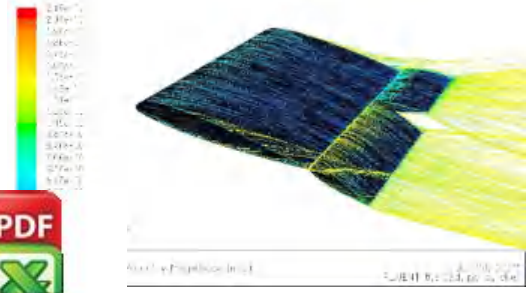


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

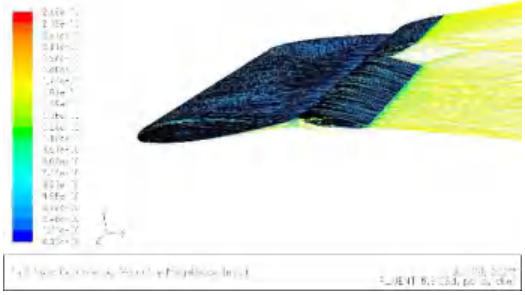
Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s



Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

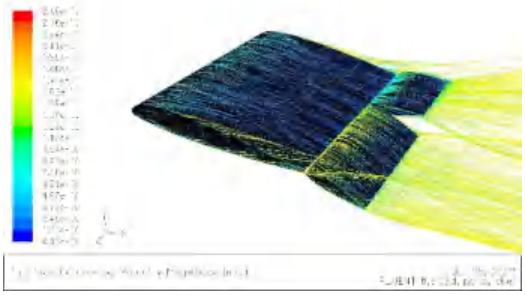


ıg *airfoil* (α = 15˚) dan U_0 = 15 m/s

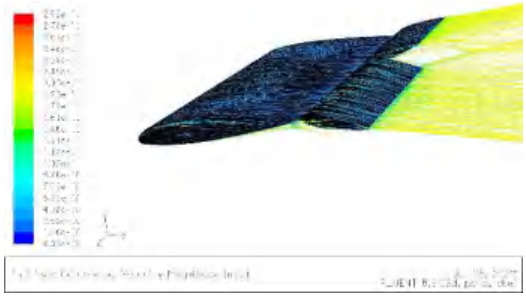


Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s

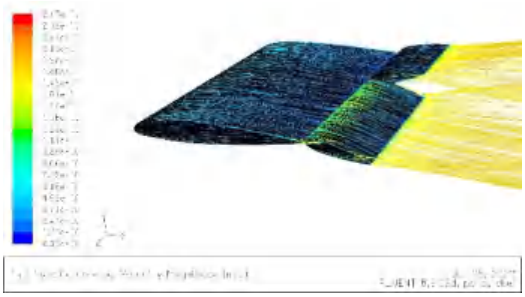
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



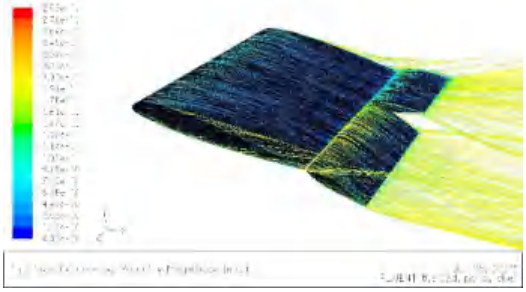
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

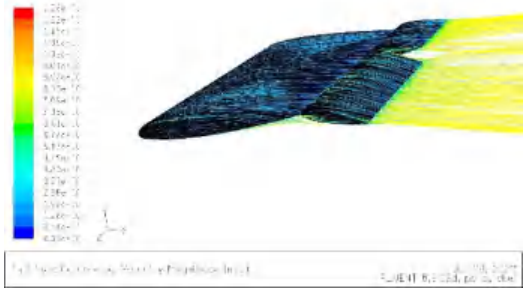


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s



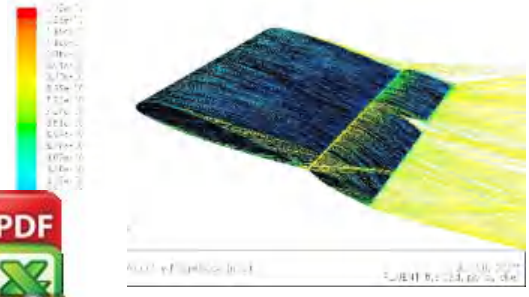
Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

12. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 15˚ dan δ_k = 0˚

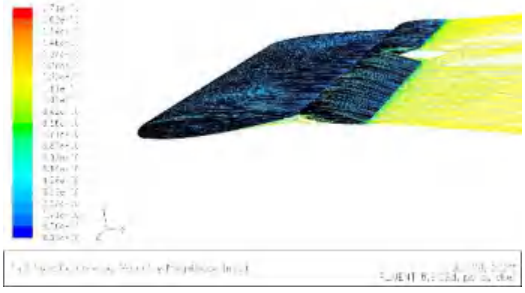


Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

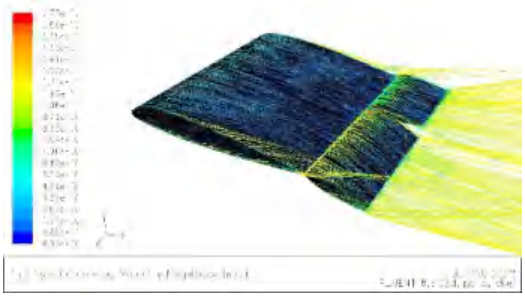


ıg *airfoil* (α = 15˚) dan U_0 = 9 m/s

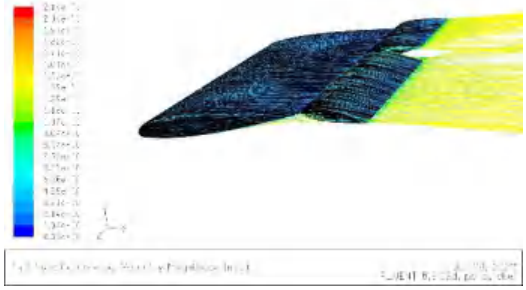


Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

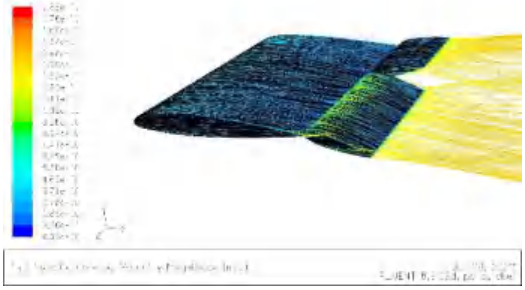
Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s



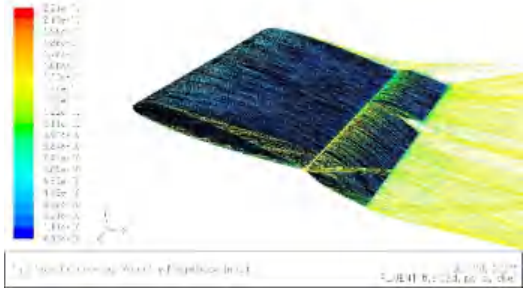
Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s



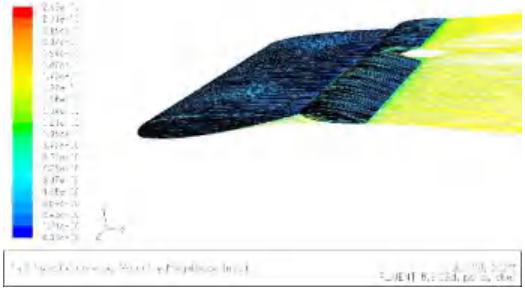
Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s



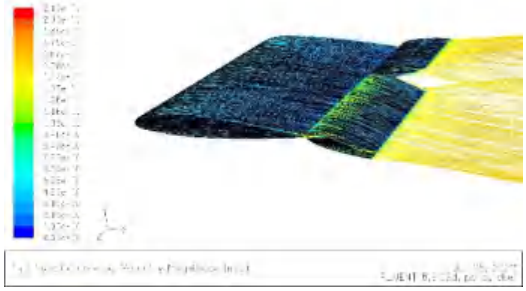
Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



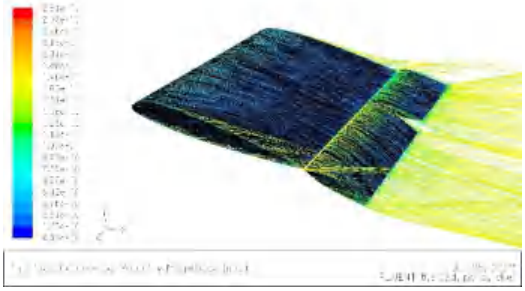
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



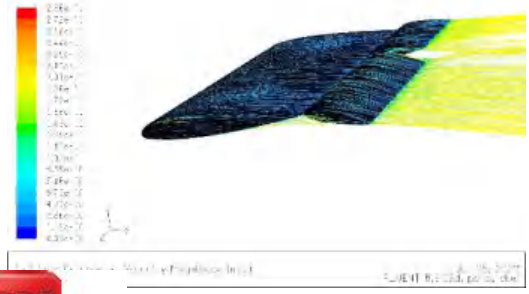
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



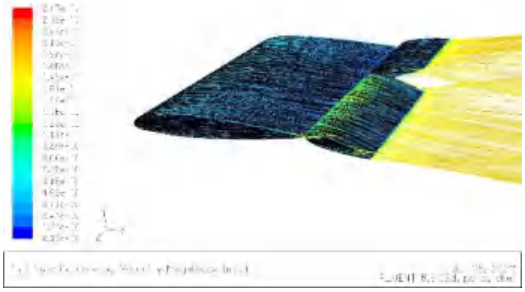
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



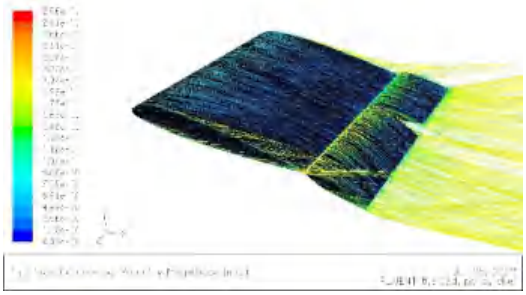
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



ıg *airfoil* (α = -10˚) dan U_0 = 20 m/s

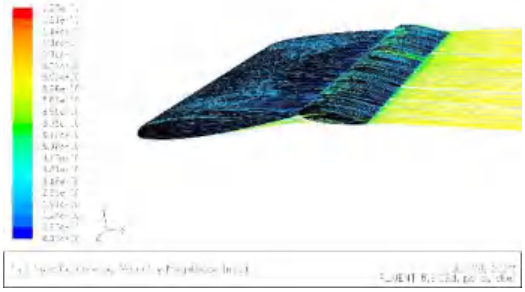


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

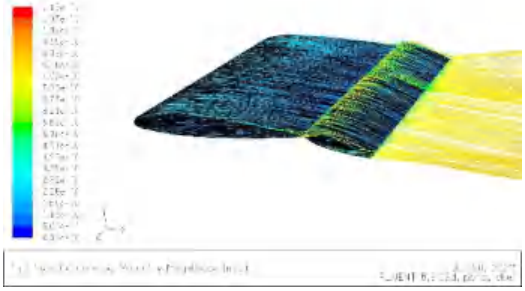


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

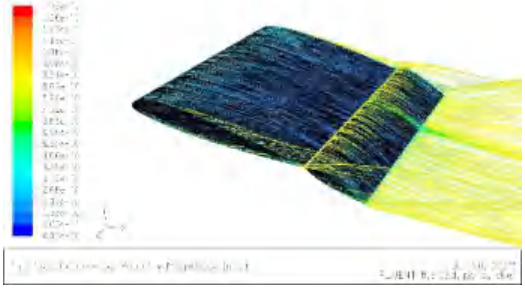
13. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 15˚ dan δ_k = 15˚



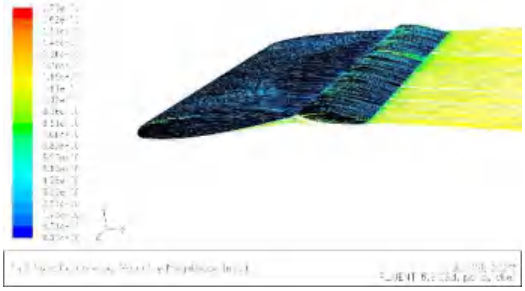
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



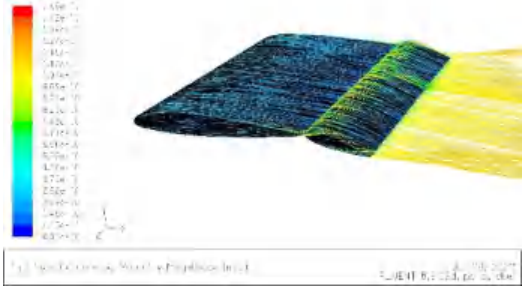
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



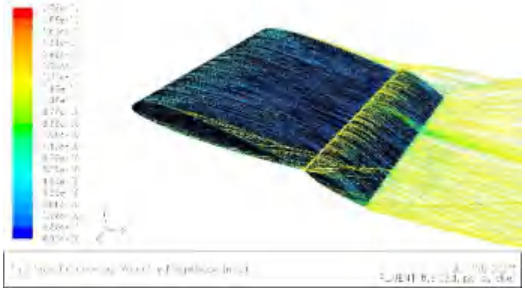
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



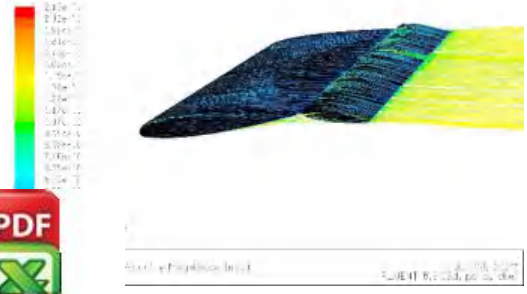
Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s



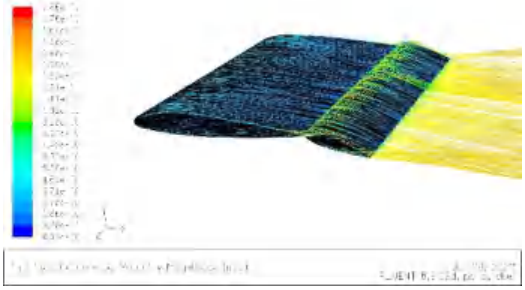
Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s



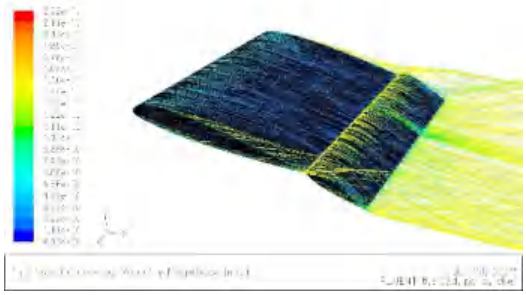
Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s



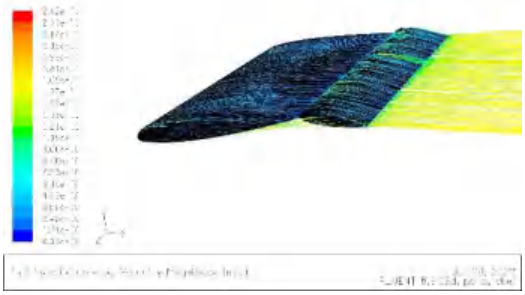
ıg *airfoil* (α = -10˚) dan U_0 = 15 m/s



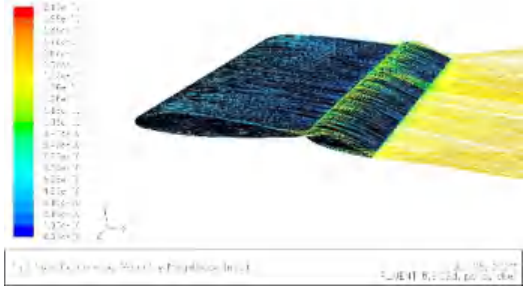
Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



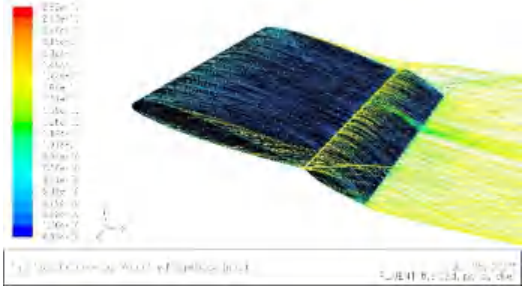
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



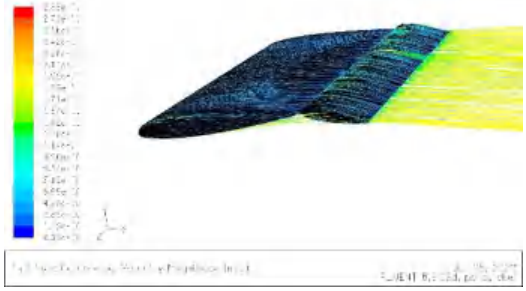
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



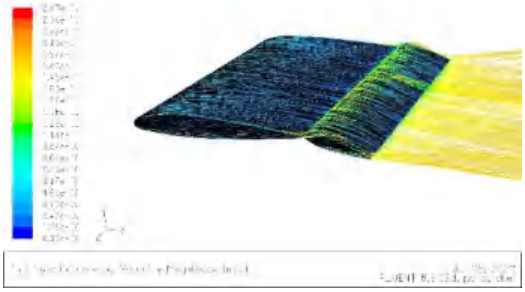
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



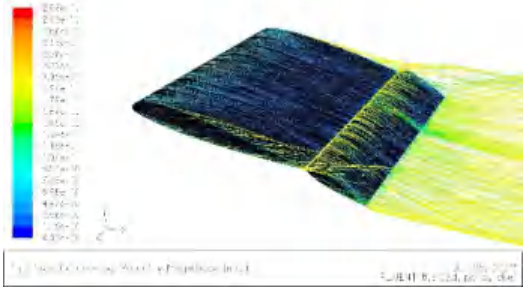
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

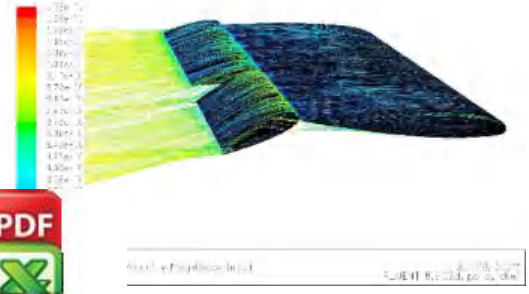


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

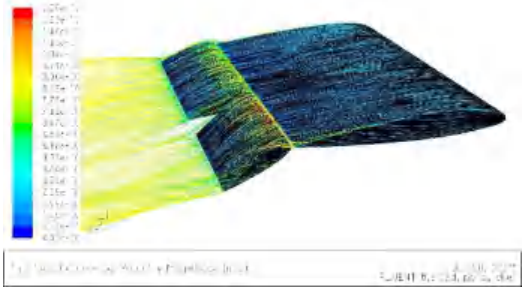


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

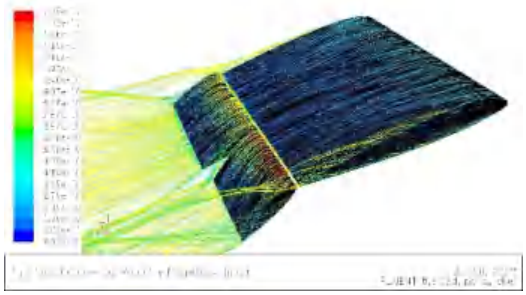
14. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 15˚ dan δ_k = 30˚



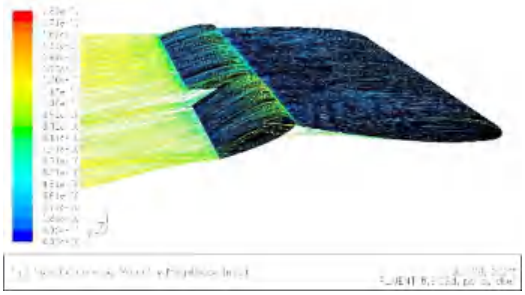
ıg *airfoil* (α = -10˚) dan U_0 = 9 m/s



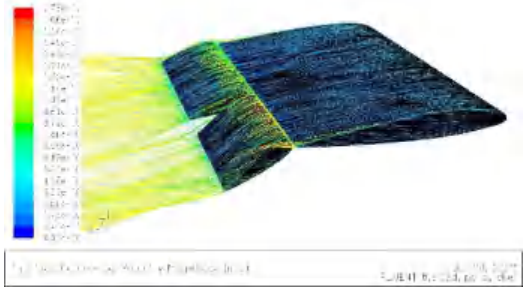
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



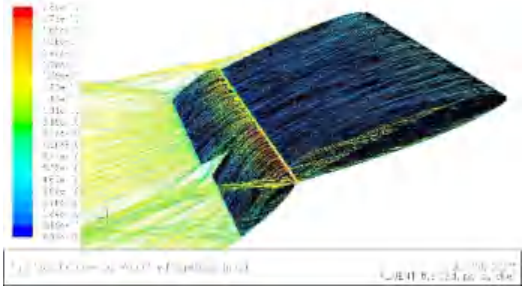
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

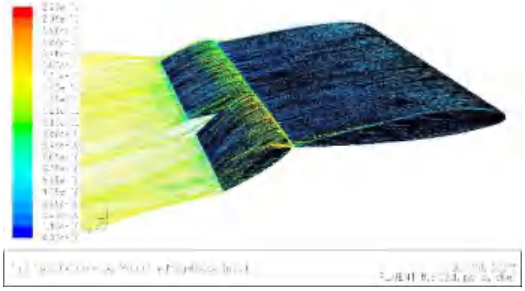


Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

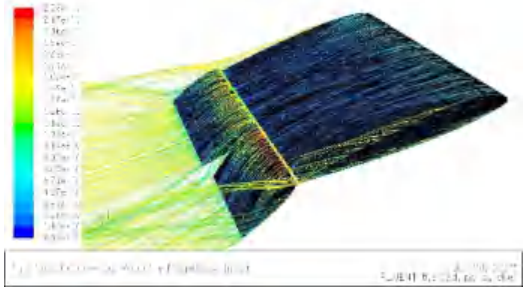


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

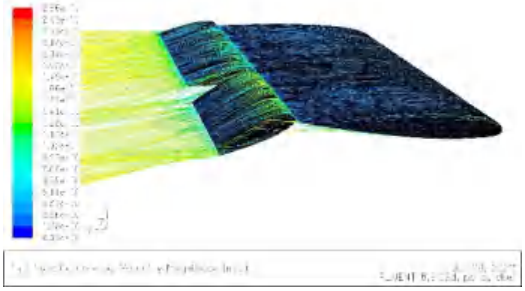
Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s



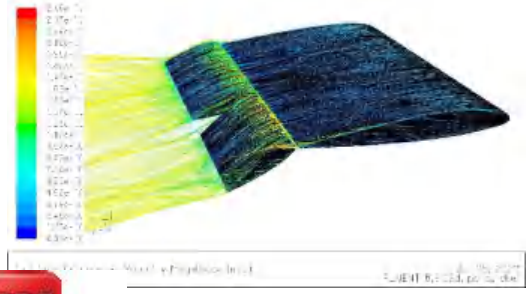
Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



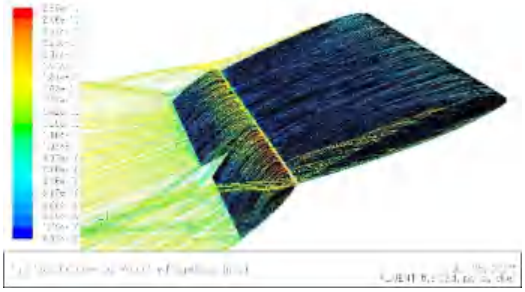
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



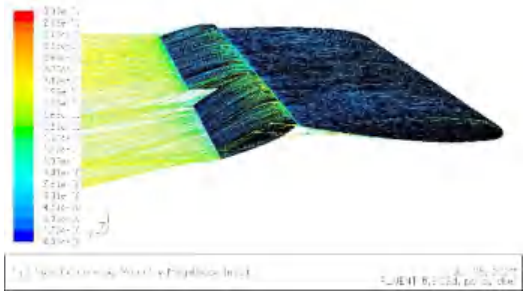
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



ıg *airfoil* (α = 0˚) dan U_0 = 17 m/s

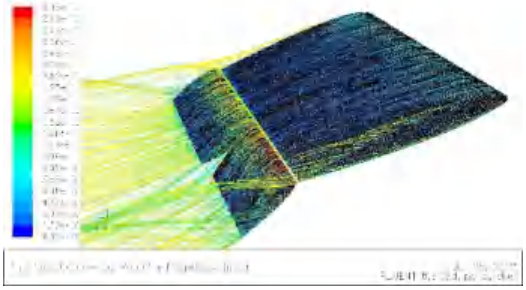


Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



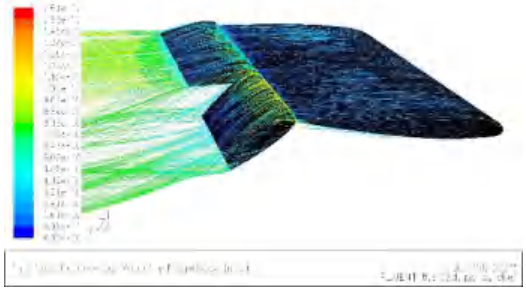
Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

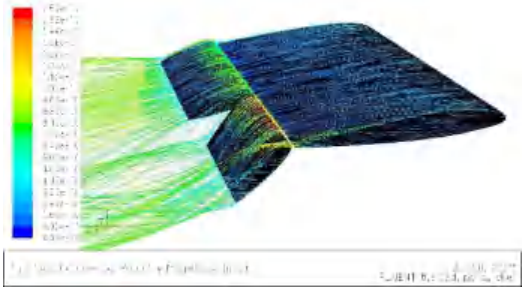


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

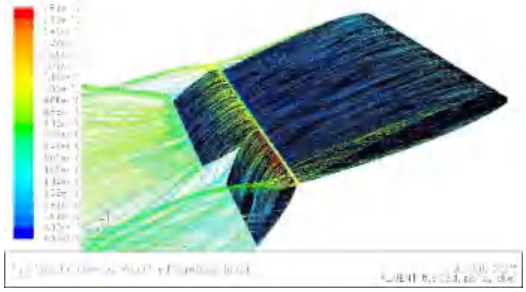
15. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 15˚ dan δ_k = 45˚



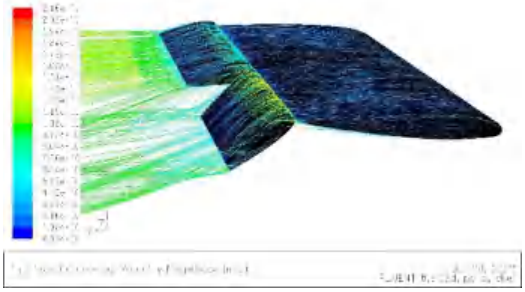
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



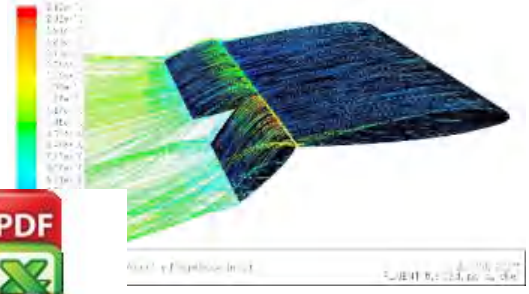
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



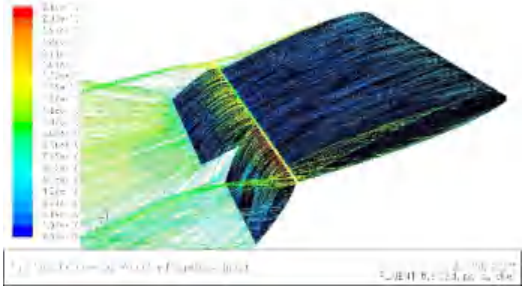
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

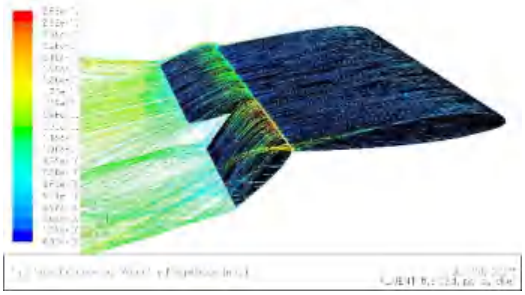


ıg *airfoil* (α = 0˚) dan U_0 = 12 m/s

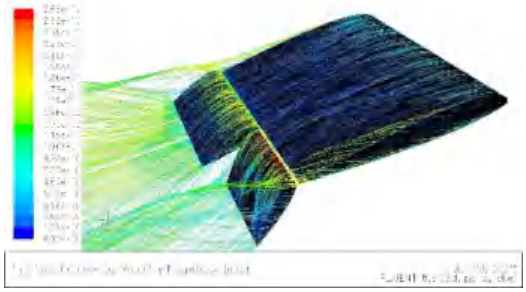


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

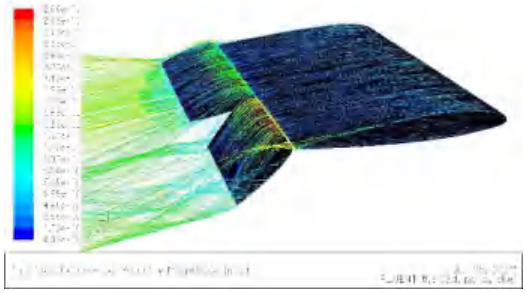


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

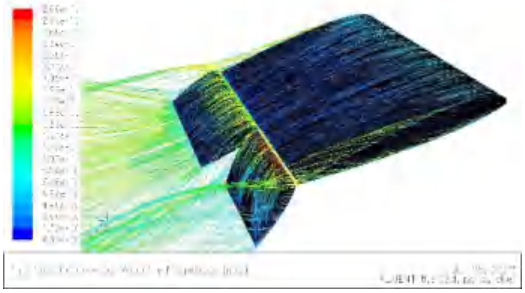


Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

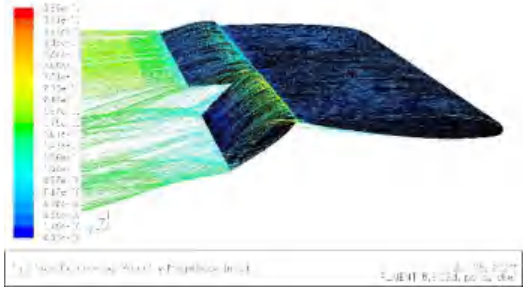
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



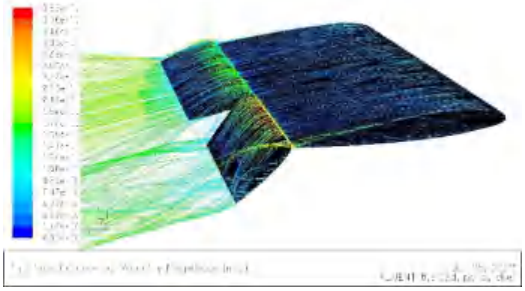
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



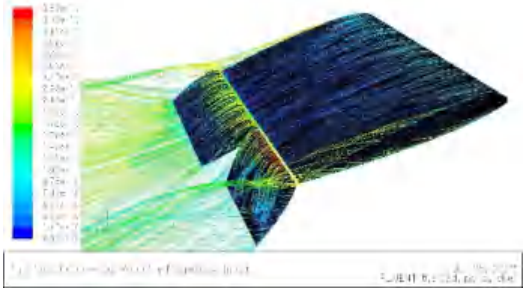
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

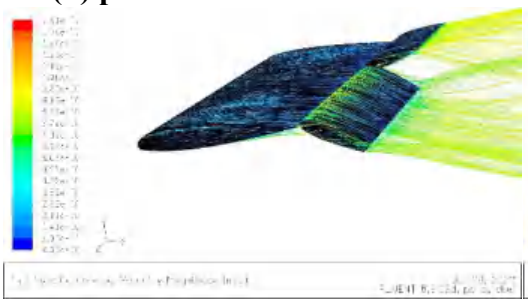


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

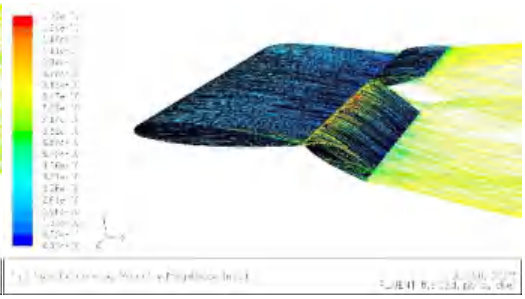


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

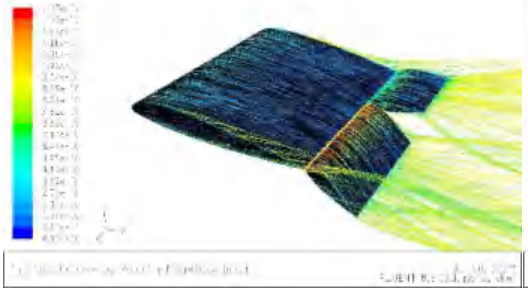
16. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada $\delta_u = 30^\circ$ dan $\delta_k = -10^\circ$



Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s

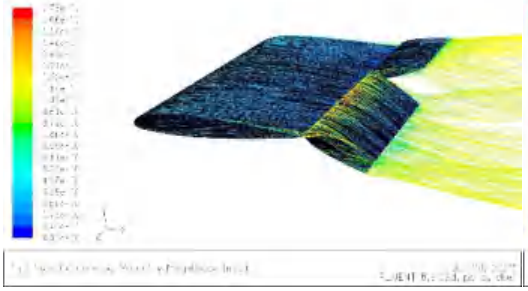


Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

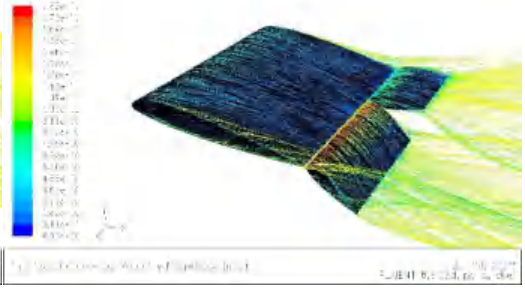


Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s

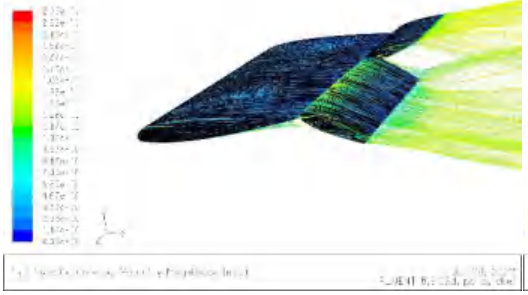
Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s



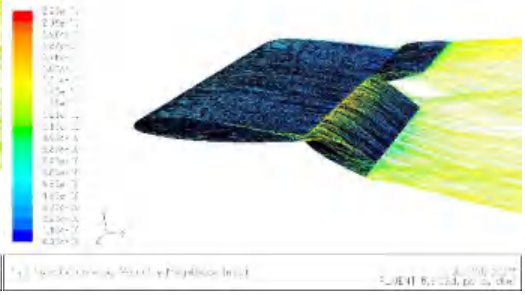
Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s



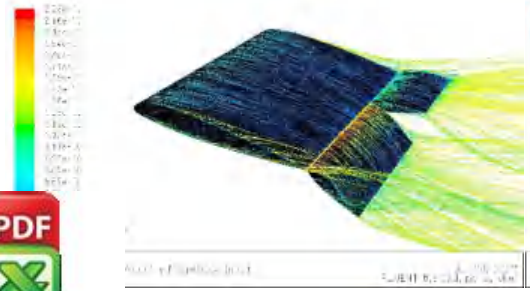
Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

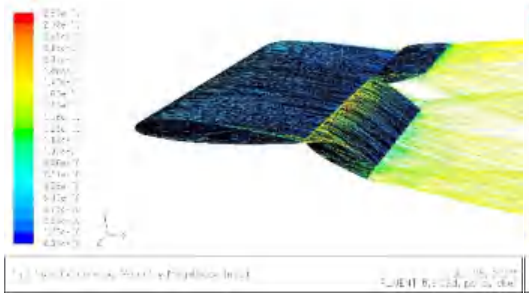


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

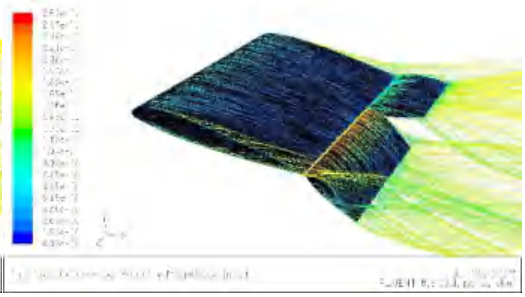


ıg *airfoil* (α = 15˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s

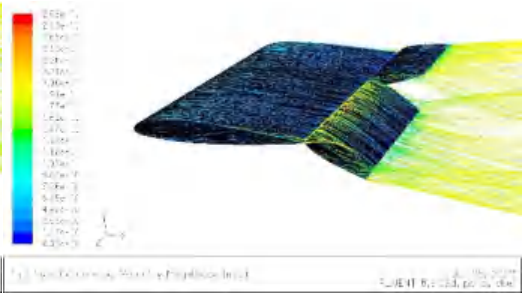


Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s

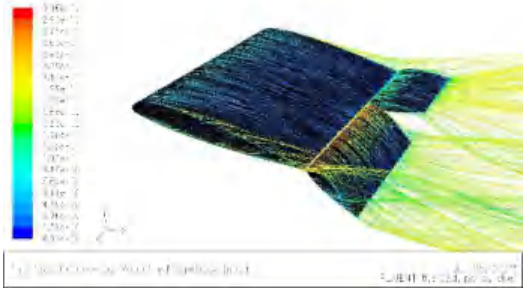


Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

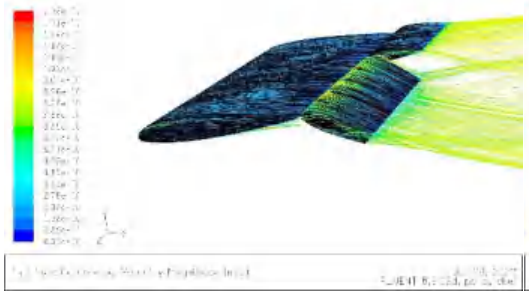


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

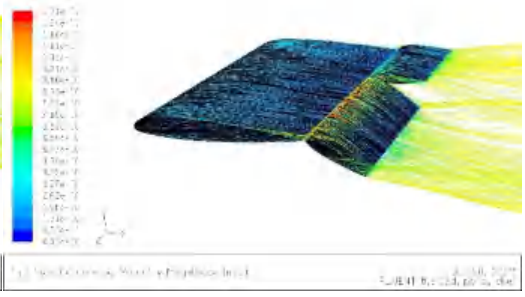


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

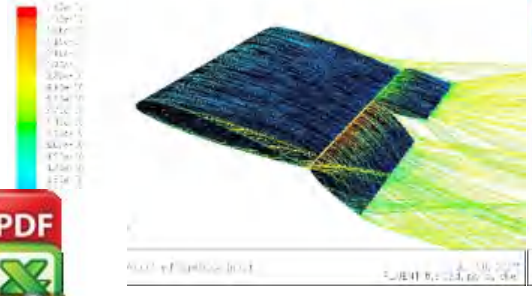
17. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 30˚ dan δ_k = 0˚



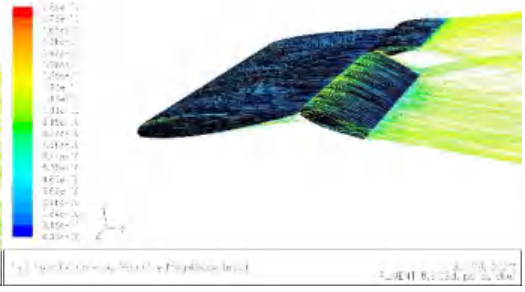
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



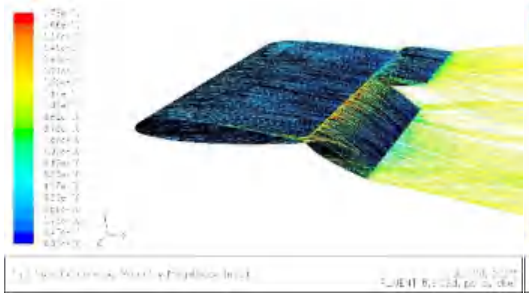
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



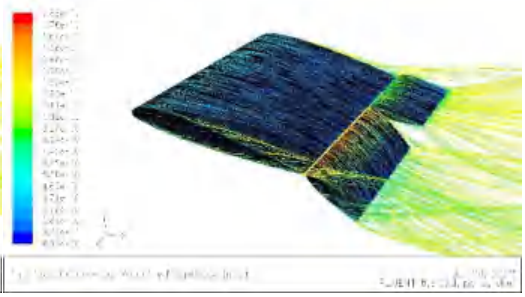
ıg *airfoil* (α = 15˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

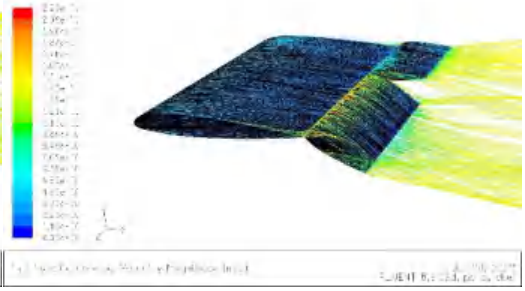


Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

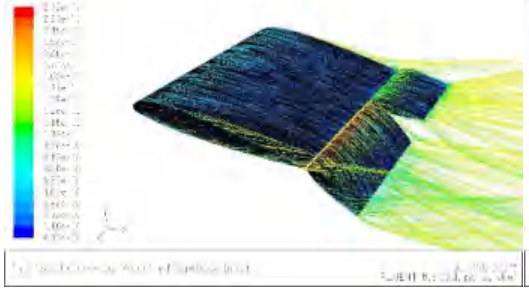


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

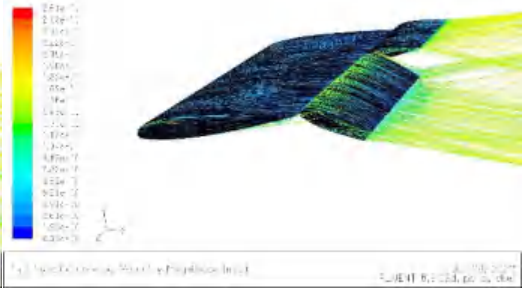
Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s



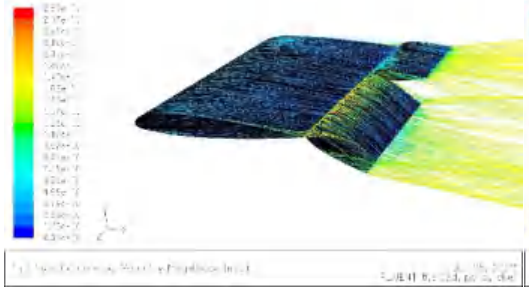
Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



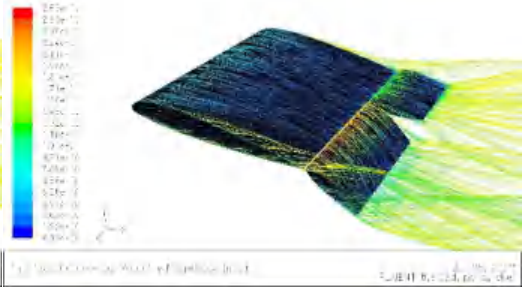
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



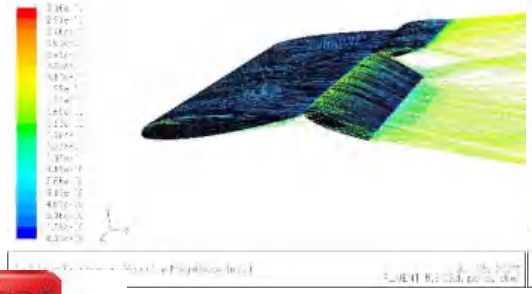
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



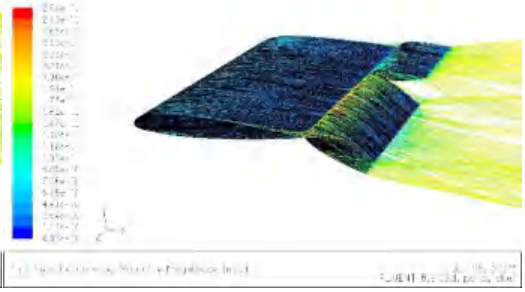
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



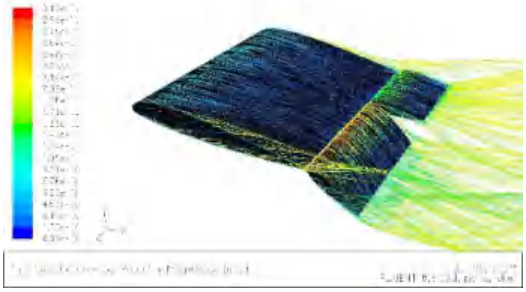
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



ıg *airfoil* (α = -10˚) dan U_0 = 20 m/s

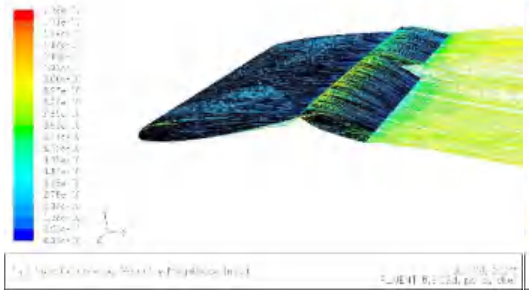


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

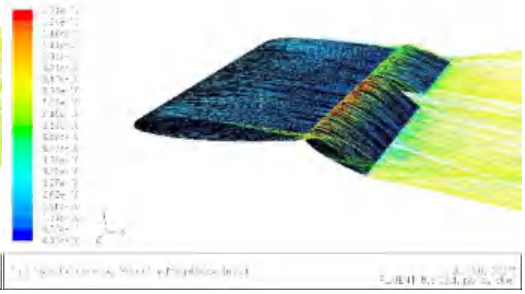


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

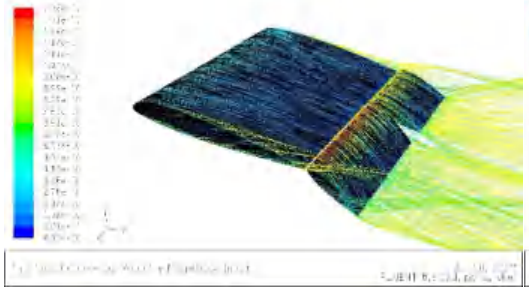
18. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 30˚ dan δ_k = 15˚



Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s

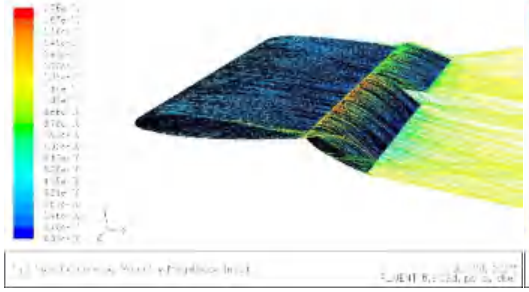


Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

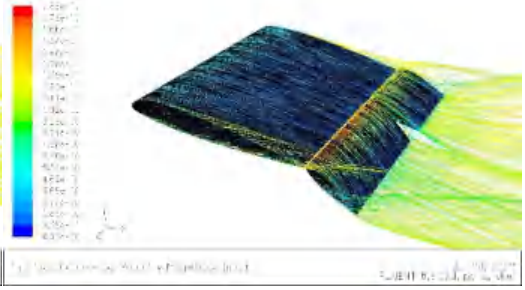


Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s

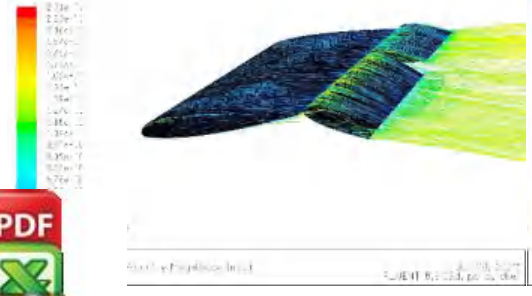
Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s



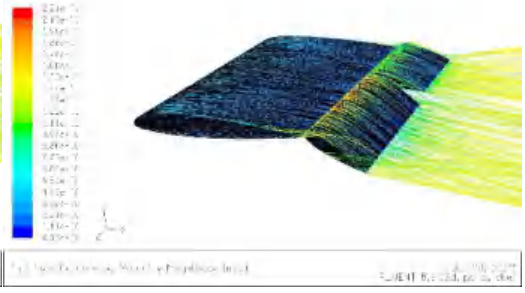
Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s



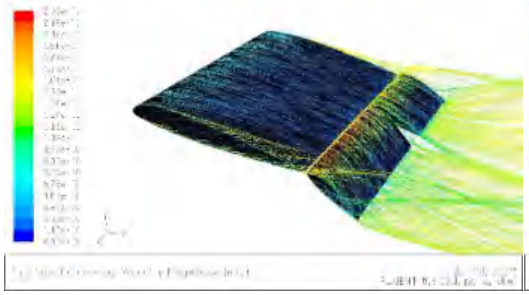
Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s



ıg *airfoil* (α = -10˚) dan U_0 = 15 m/s

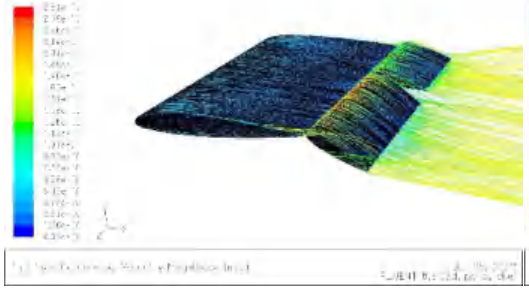


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

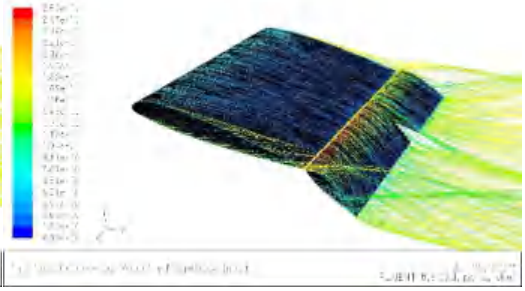


Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

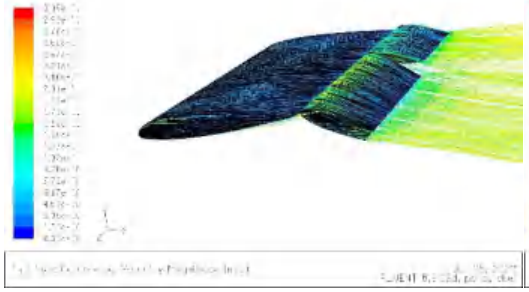
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



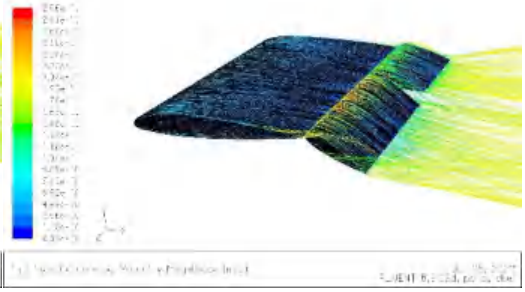
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



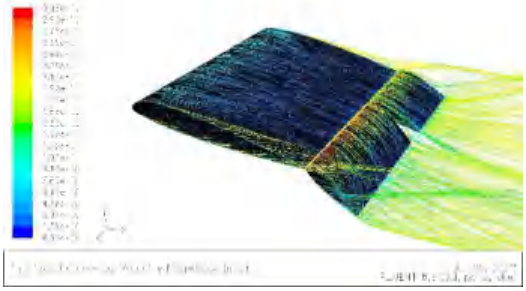
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

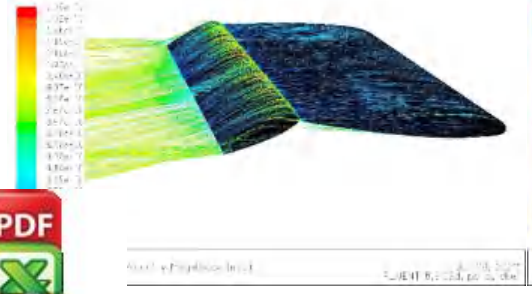


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

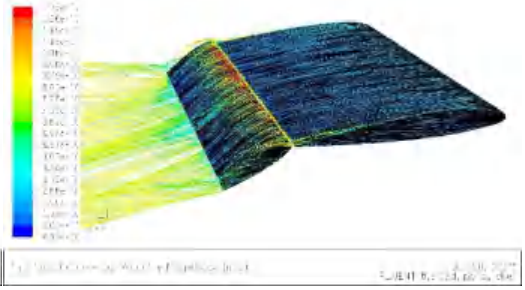


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

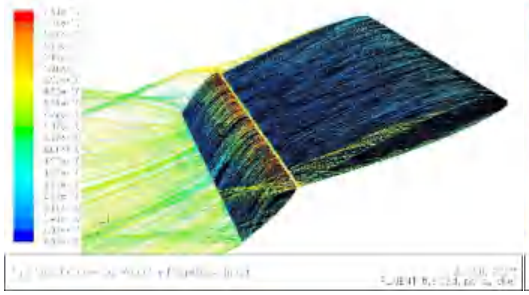
19. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 30˚ dan δ_k = 30˚



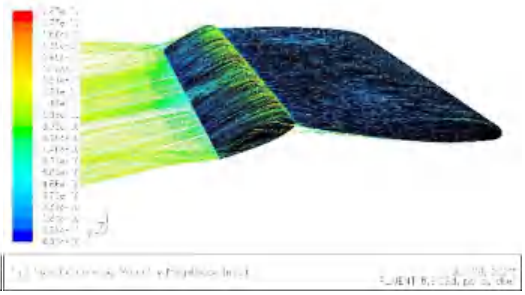
ıg *airfoil* (α = -10˚) dan U_0 = 9 m/s



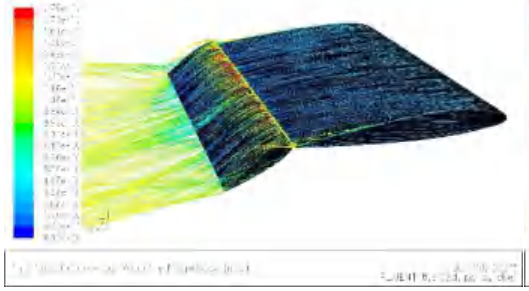
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



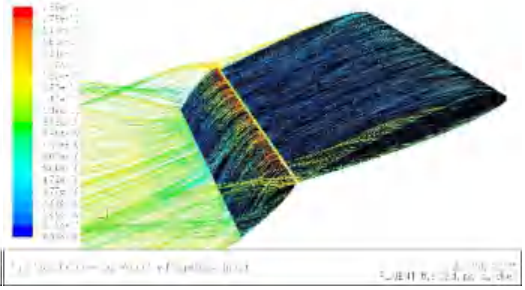
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

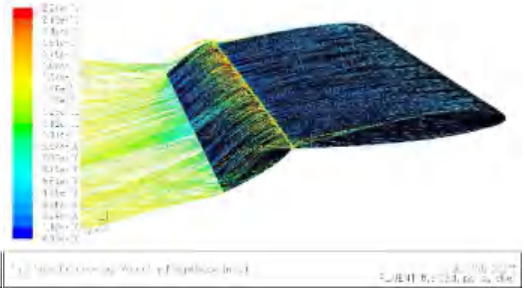


Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

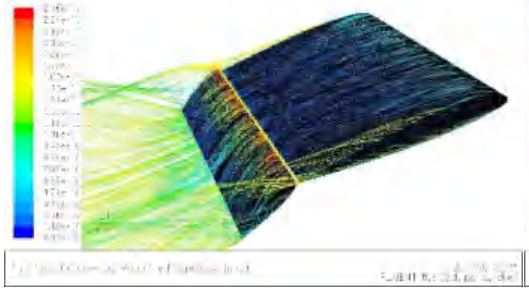


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

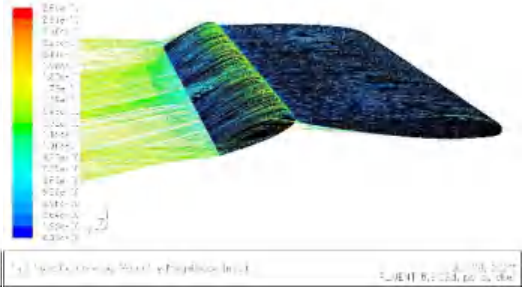
Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s



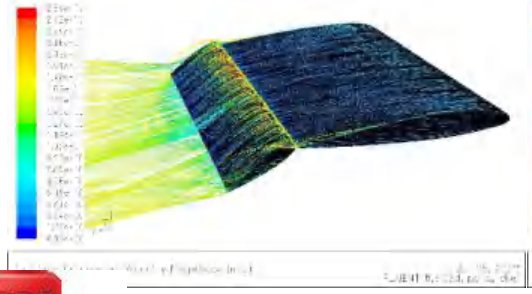
Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



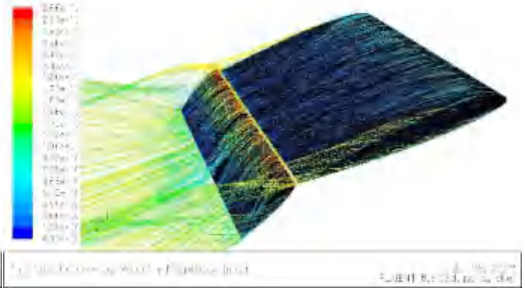
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



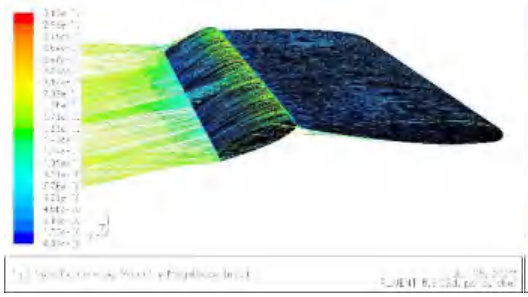
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



ıg *airfoil* (α = 0˚) dan U_0 = 17 m/s

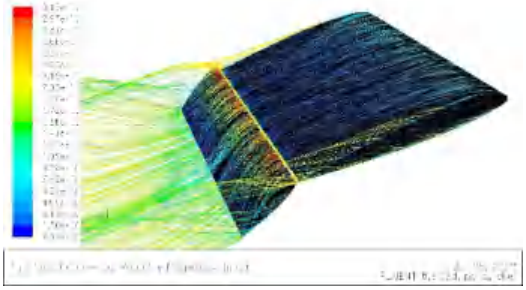


Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



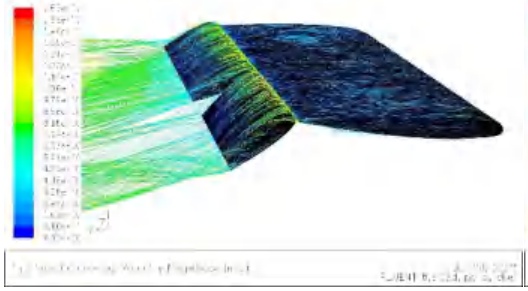
Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

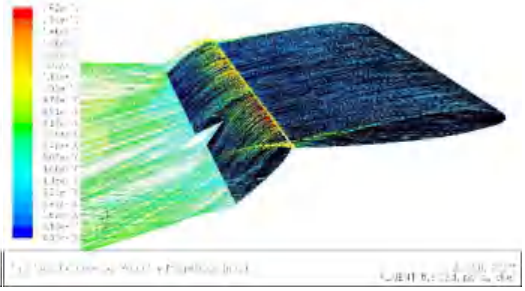


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

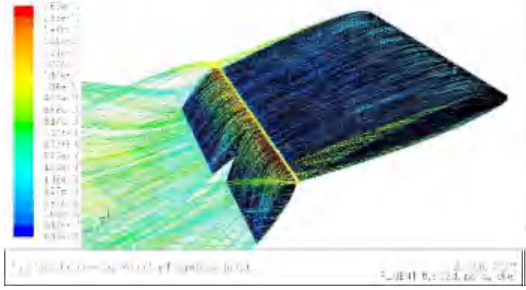
20. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 30˚ dan δ_k = 45˚



Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s

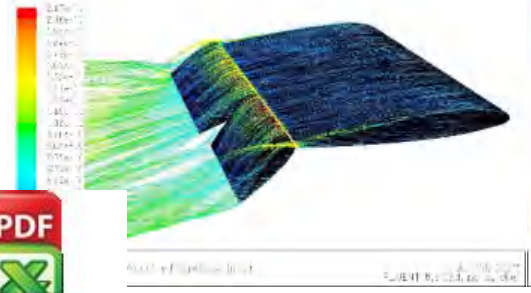


Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

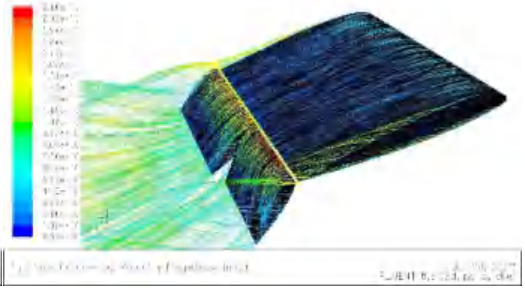


Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

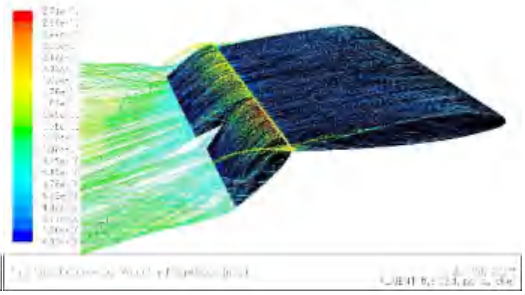


ıg *airfoil* (α = 0˚) dan U_0 = 12 m/s

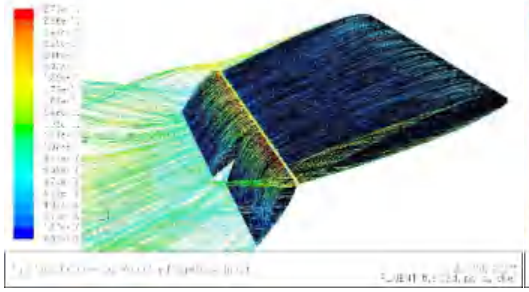


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

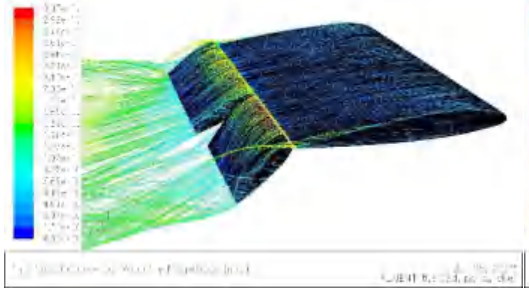


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

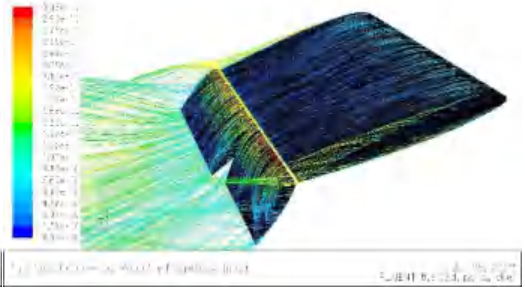


Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

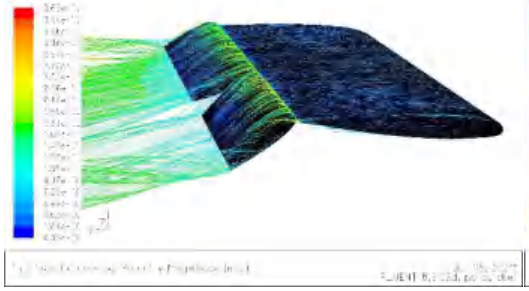
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



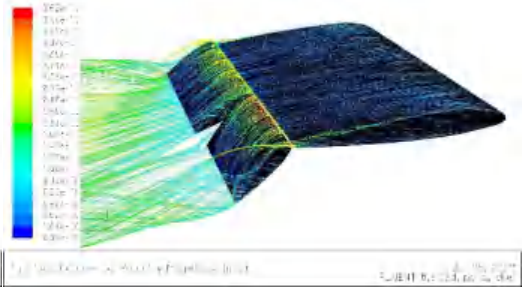
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



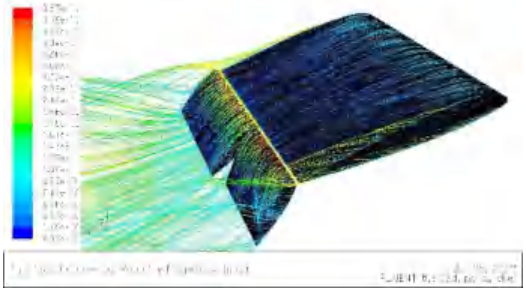
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

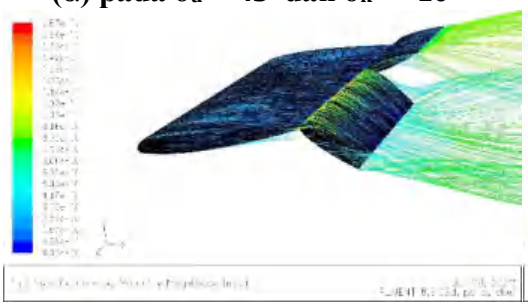


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

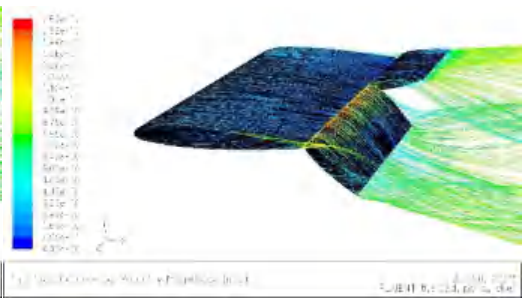


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

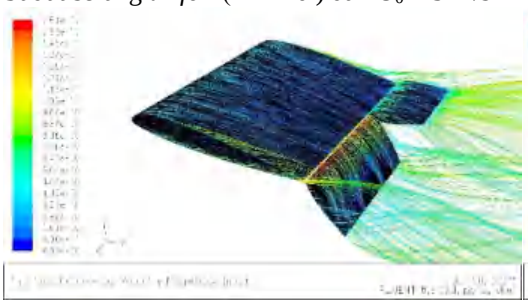
21. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 45° dan δ_k = -10°



Sudut serang *airfoil* (α = -10°) dan U_0 = 9 m/s

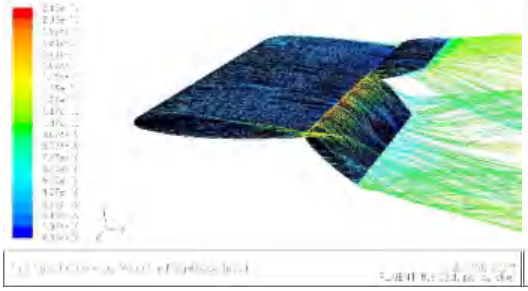


Sudut serang *airfoil* (α = 0°) dan U_0 = 9 m/s

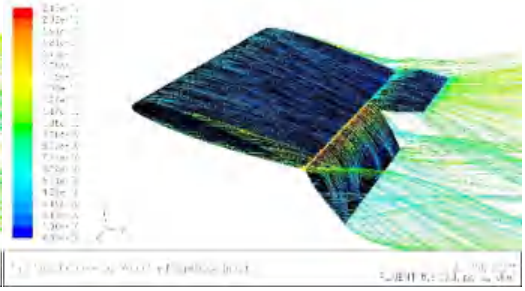


Sudut serang *airfoil* (α = 15°) dan U_0 = 9 m/s

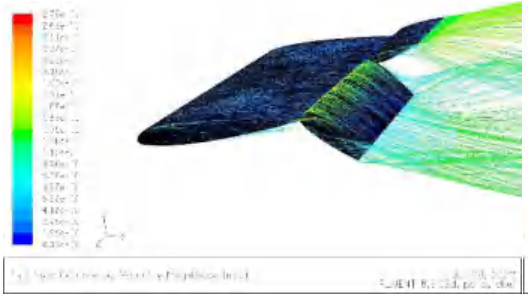
Sudut serang *airfoil* (α = -10°) dan U_0 = 12 m/s



Sudut serang *airfoil* (α = 0°) dan U_0 = 12 m/s

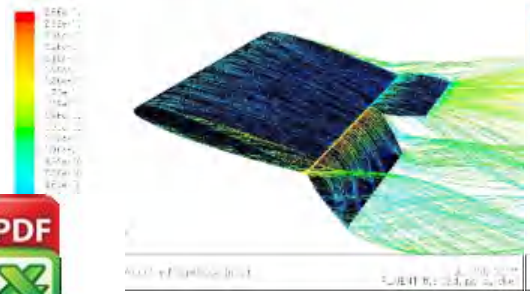


Sudut serang *airfoil* (α = 15°) dan U_0 = 12 m/s



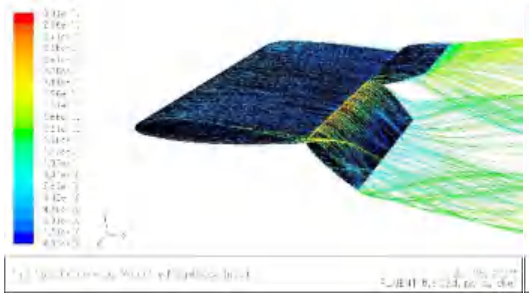
Sudut serang *airfoil* (α = -10°) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = 0°) dan U_0 = 15 m/s

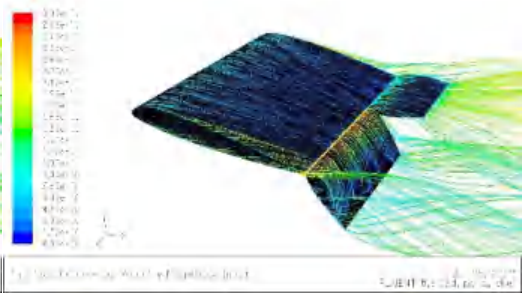


ıg *airfoil* (α = 15°) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = -10°) dan U_0 = 17 m/s

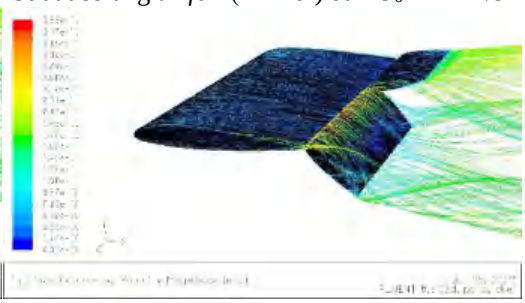


Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s

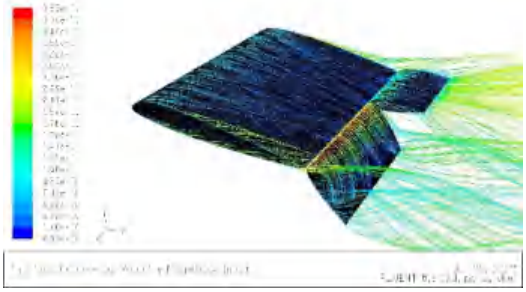


Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

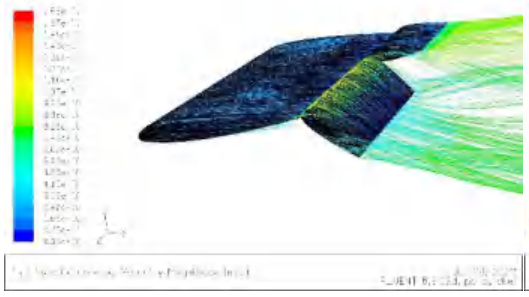


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

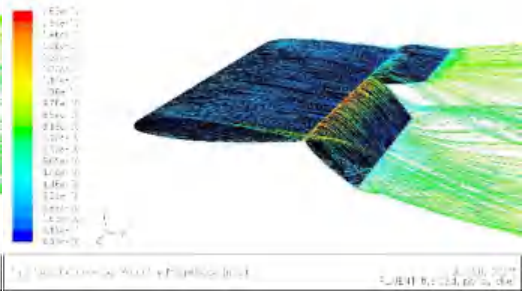


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

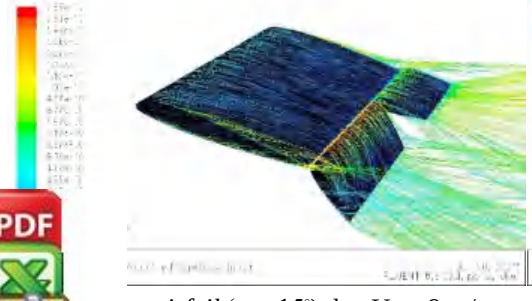
22. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 45˚ dan δ_k = 0˚



Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s

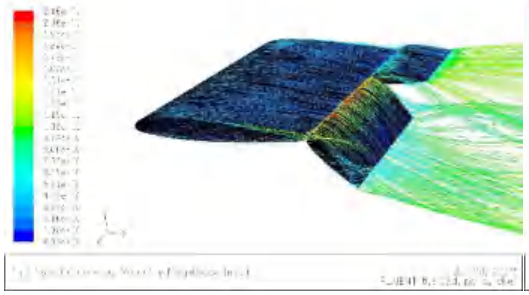


Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

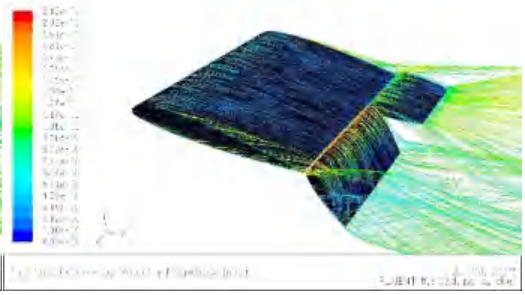


ıg *airfoil* (α = 15˚) dan U_0 = 9 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

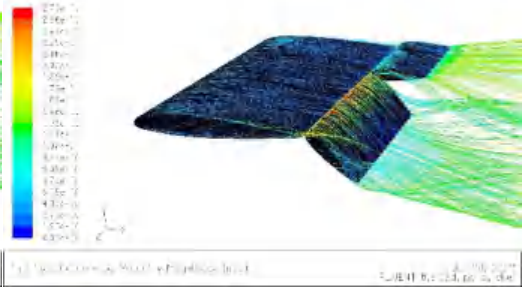


Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

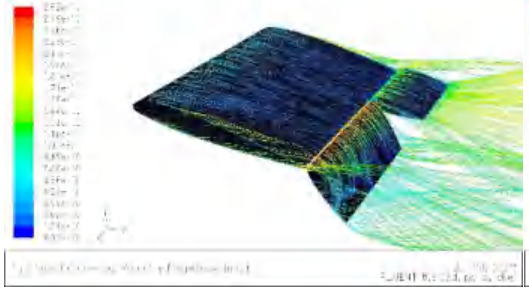


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s

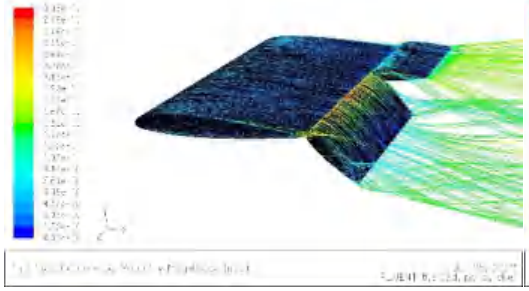


Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s

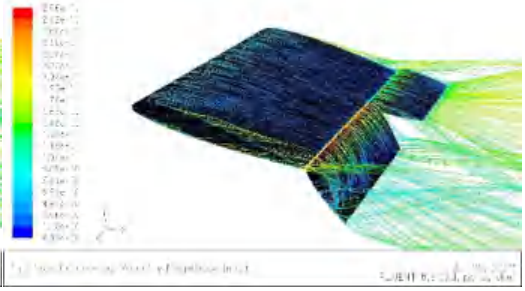


Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s

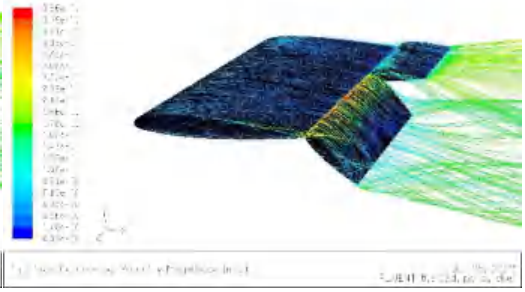


Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s

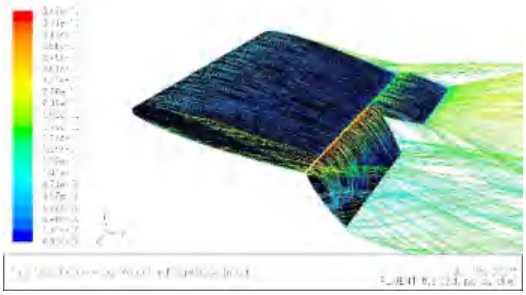


Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s

ıg *airfoil* (α = -10˚) dan U_0 = 20 m/s

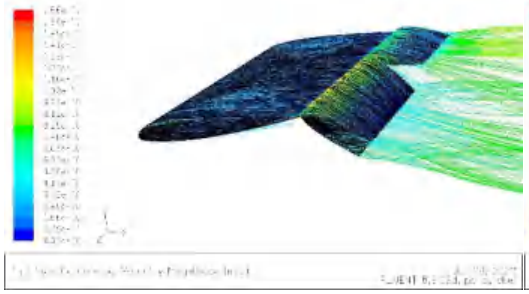


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

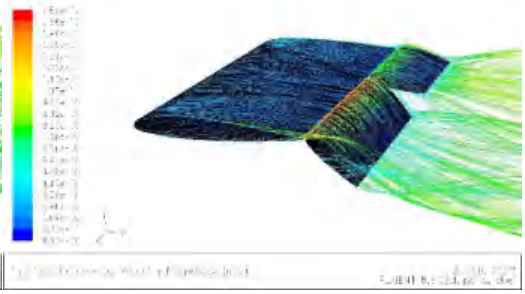


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

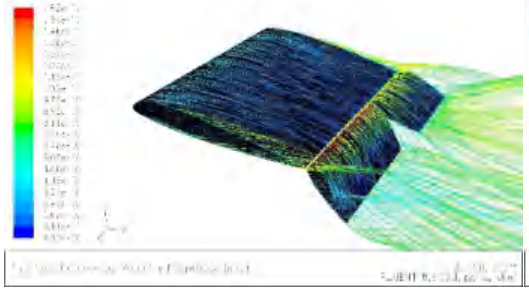
23. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 45˚ dan δ_k = 15˚



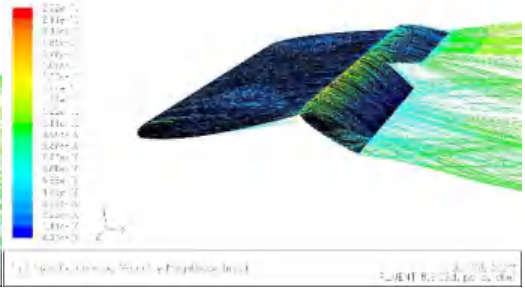
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



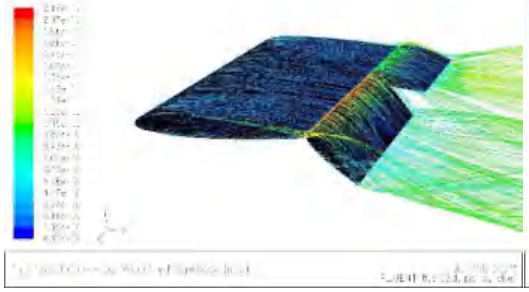
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



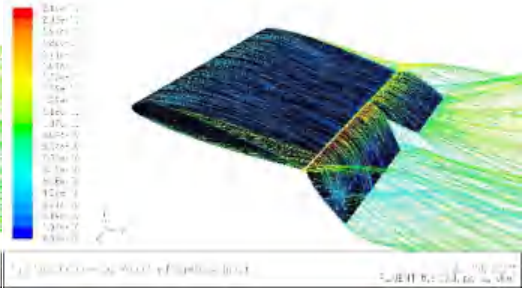
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



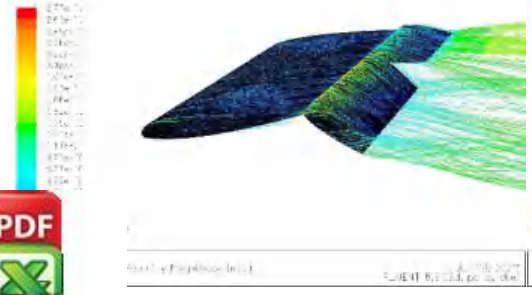
Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s



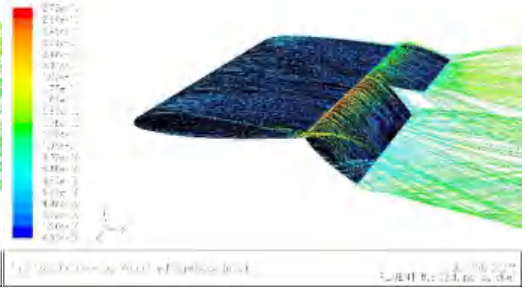
Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s



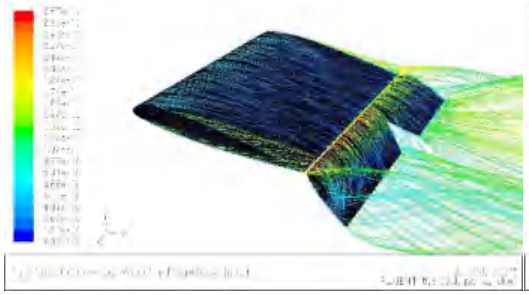
Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s



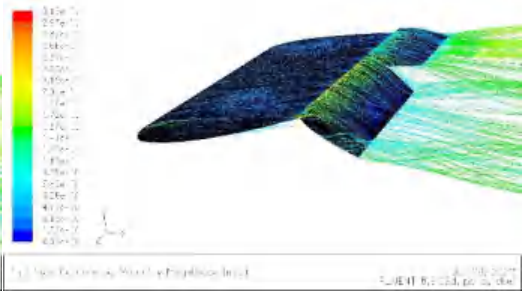
ıg *airfoil* (α = -10˚) dan U_0 = 15 m/s



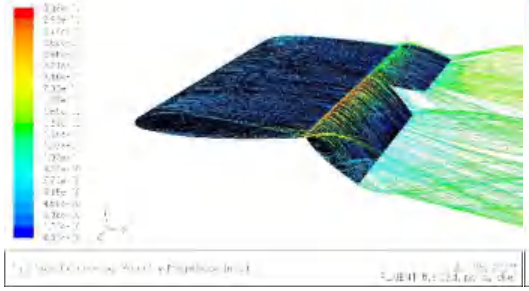
Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



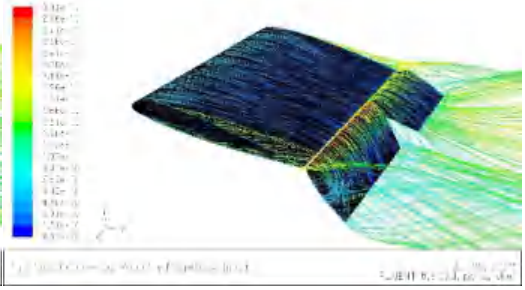
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



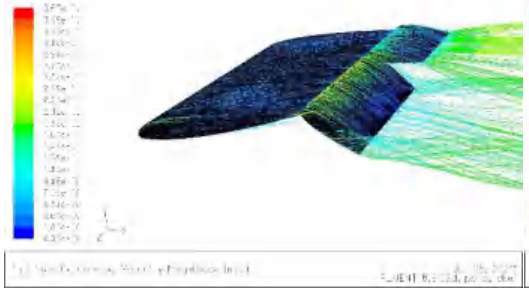
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



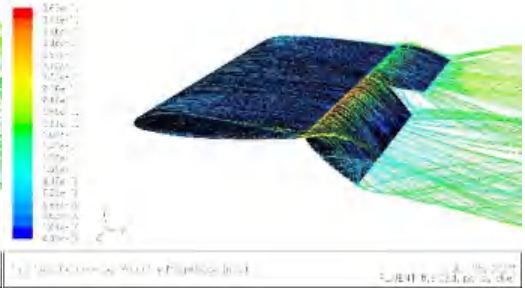
Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s



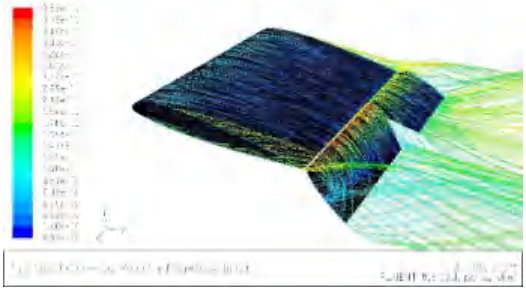
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s

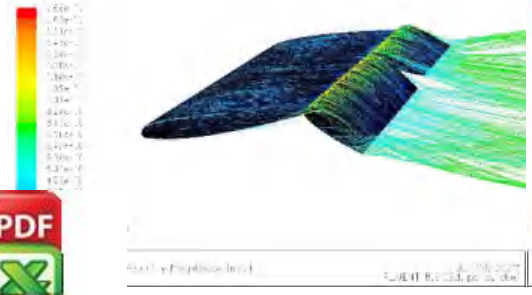


Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s

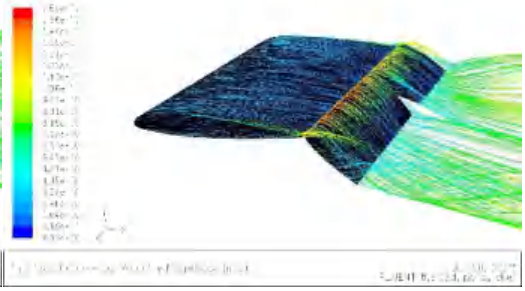


Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

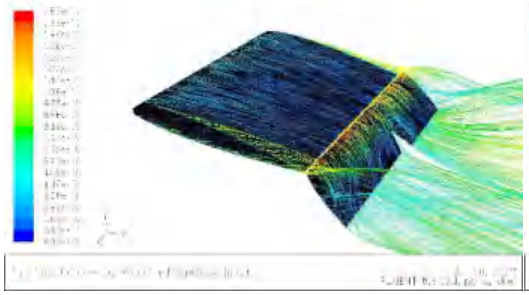
24. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 45˚ dan δ_k = 30˚



ıg *airfoil* (α = -10˚) dan U_0 = 9 m/s

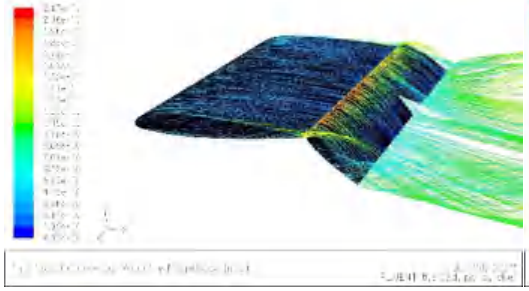


Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s

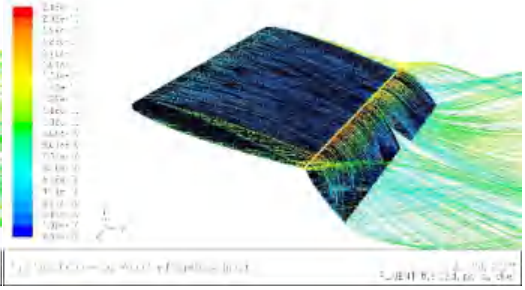


Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s

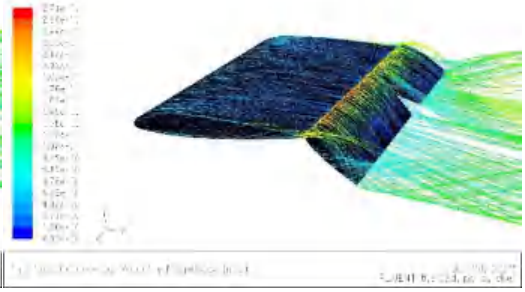


Sudut serang *airfoil* (α = 0˚) dan U_0 = 12 m/s

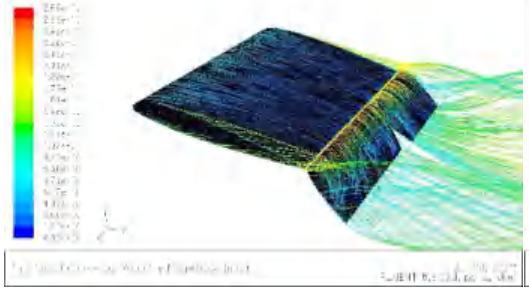


Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s

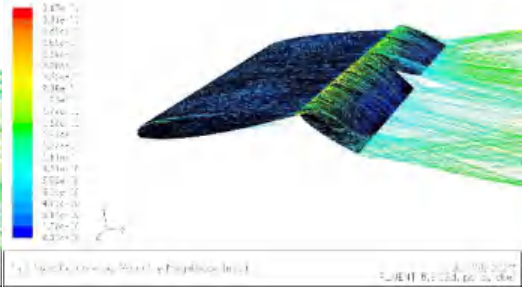
Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s



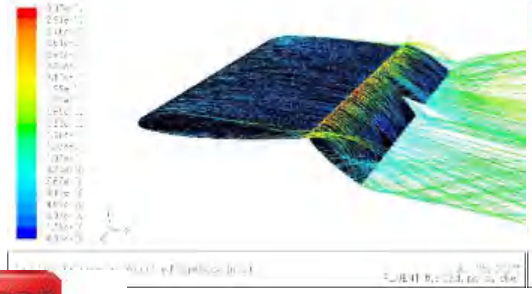
Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



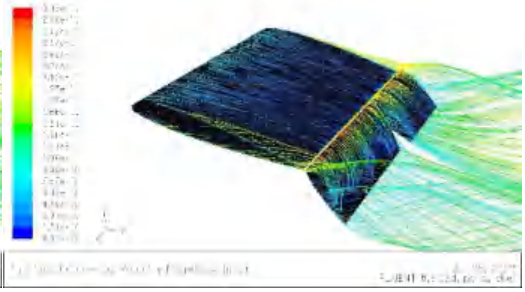
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



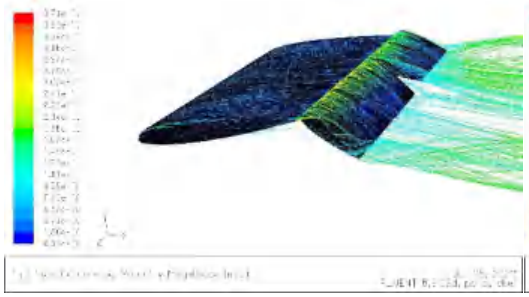
Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s



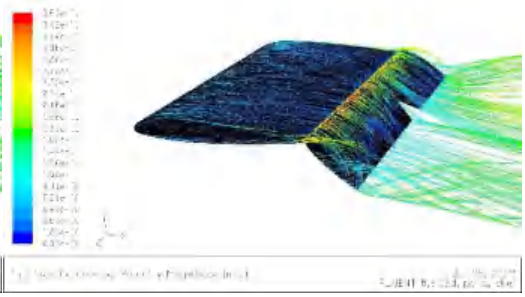
ıg *airfoil* (α = 0˚) dan U_0 = 17 m/s



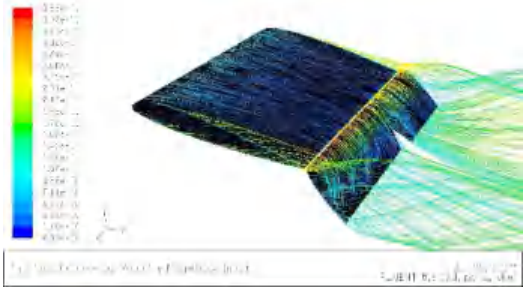
Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s



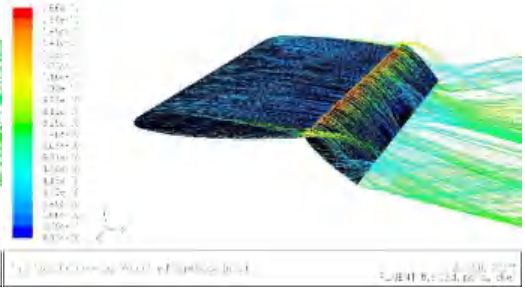
Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s



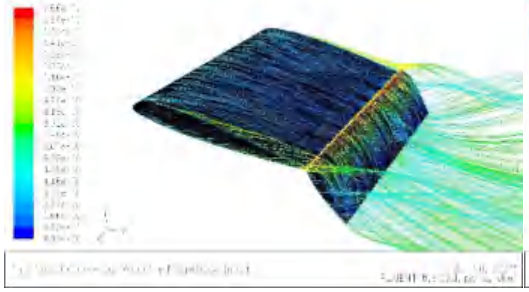
Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

25. Karakteristik aliran pada model uji dengan variasi sudut serang airfoil (α) pada δ_u = 45˚ dan δ_k = 45˚

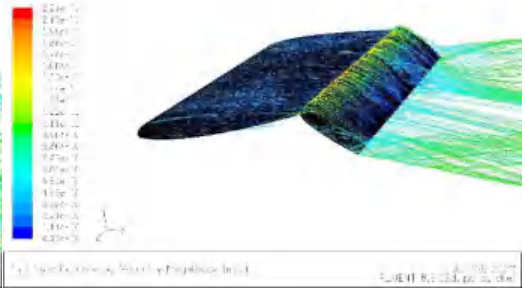
Sudut serang *airfoil* (α = -10˚) dan U_0 = 9 m/s



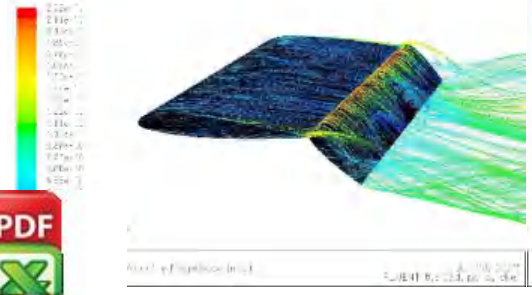
Sudut serang *airfoil* (α = 0˚) dan U_0 = 9 m/s



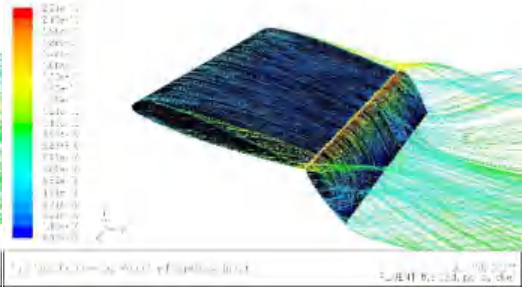
Sudut serang *airfoil* (α = 15˚) dan U_0 = 9 m/s



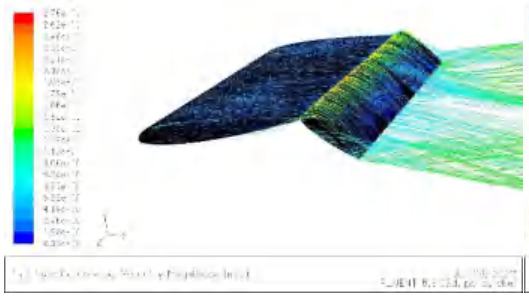
Sudut serang *airfoil* (α = -10˚) dan U_0 = 12 m/s



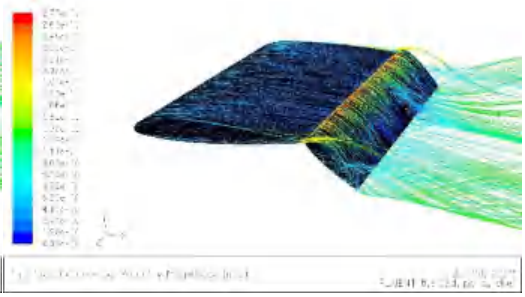
ıg *airfoil* (α = 0˚) dan U_0 = 12 m/s



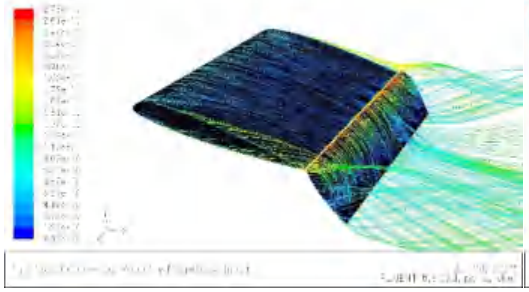
Sudut serang *airfoil* (α = 15˚) dan U_0 = 12 m/s



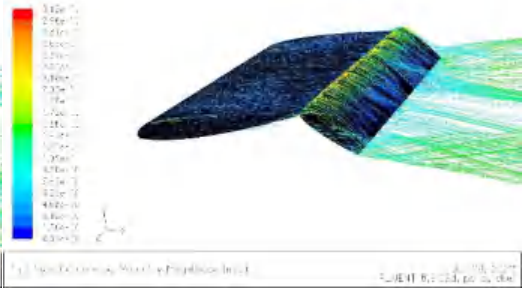
Sudut serang *airfoil* (α = -10˚) dan U_0 = 15 m/s



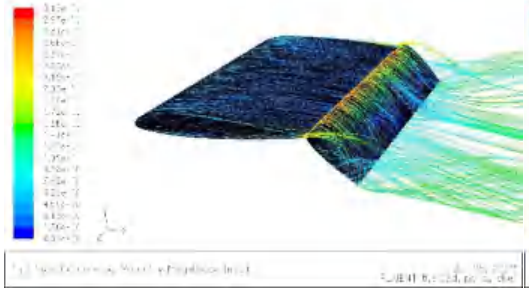
Sudut serang *airfoil* (α = 0˚) dan U_0 = 15 m/s



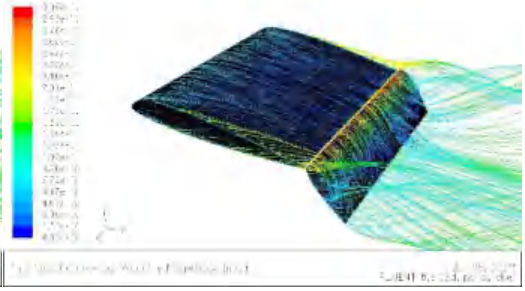
Sudut serang *airfoil* (α = 15˚) dan U_0 = 15 m/s



Sudut serang *airfoil* (α = -10˚) dan U_0 = 17 m/s

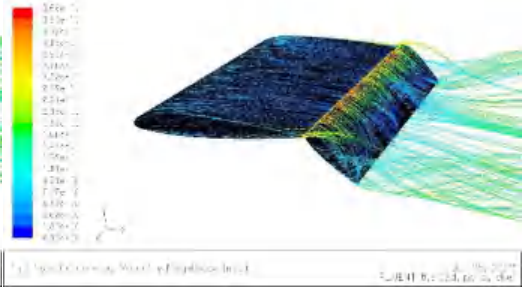


Sudut serang *airfoil* (α = 0˚) dan U_0 = 17 m/s

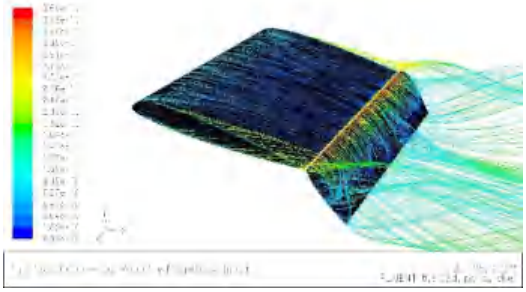


Sudut serang *airfoil* (α = 15˚) dan U_0 = 17 m/s

Sudut serang *airfoil* (α = -10˚) dan U_0 = 20 m/s



Sudut serang *airfoil* (α = 0˚) dan U_0 = 20 m/s



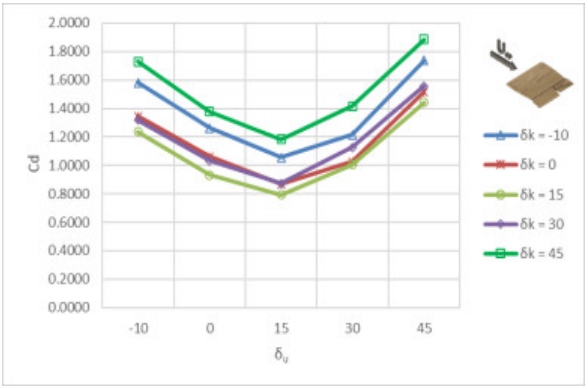
Sudut serang *airfoil* (α = 15˚) dan U_0 = 20 m/s

Lampiran 2 Tabel dan grafik hubungan koefisien *drag* terhadap *flap* secara ekperimental

1. Tabel dan grafik hubungan koefisien *drag flap* utama terhadap *flap* kendali

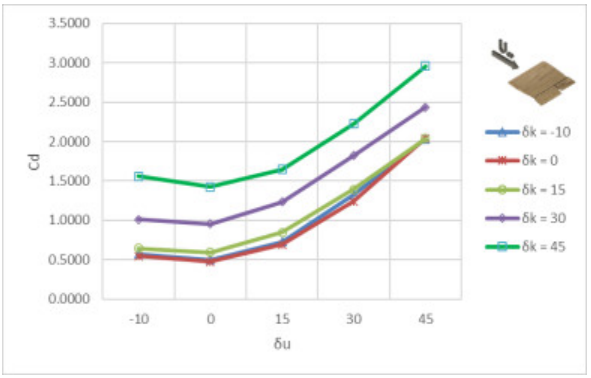
a. Kecepatan 20 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.5808	1.3443	1.2353	1.3203	1.7308
0	1.2619	1.0627	0.9323	1.0324	1.3786
15	1.0575	0.8663	0.7939	0.8723	1.1818
30	1.2167	1.0271	1.0074	1.1284	1.4157
45	1.7378	1.5176	1.4440	1.5577	1.8866



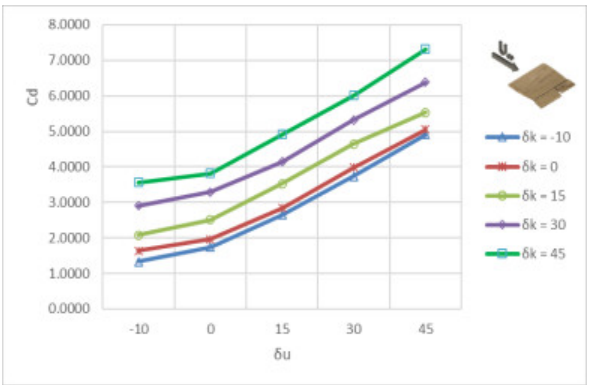
b. Kecepatan 20 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.5714	0.5485	0.6437	1.0120	1.5587
0	0.5012	0.4750	0.5929	0.9526	1.4256
15	0.7287	0.6928	0.8445	1.2347	1.6448
30	1.3238	1.2414	1.3958	1.8219	2.2243
45	2.0369	2.0447	2.0376	2.4386	2.9576



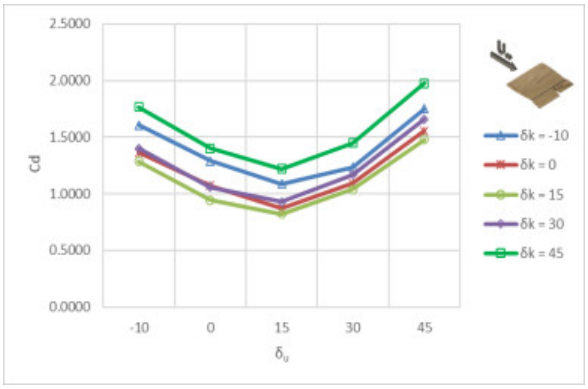
c. Kecepatan 20 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.3363	1.6334	2.0817	2.9113	3.5577
0	1.7375	1.9616	2.5087	3.2858	3.8112
15	2.6476	2.8361	3.5281	4.1454	4.9069
30	3.7369	3.9784	4.6406	5.3234	6.0109
45	4.9176	5.0514	5.5367	6.3861	7.3124



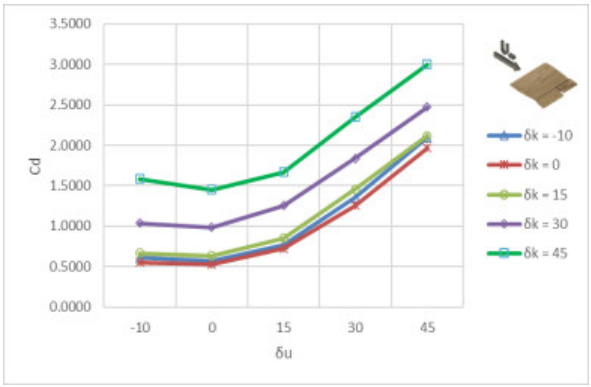
d. Kecepatan 17 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6087	1.3660	1.2860	1.4001	1.7685
0	1.2919	1.0723	0.9441	1.0579	1.4014
15	1.0864	0.8719	0.8219	0.9307	1.2192
30	1.2340	1.0917	1.0397	1.1699	1.4498
45	1.7520	1.5550	1.4808	1.6597	1.9770



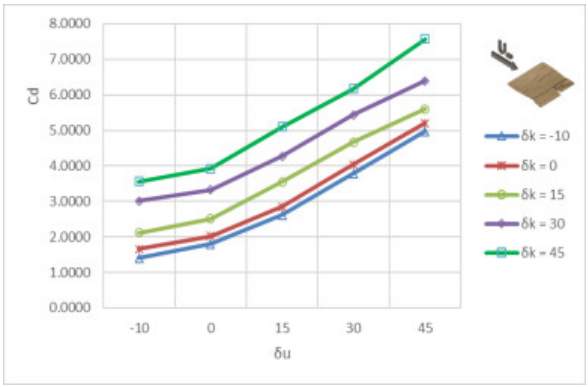
e. Kecepatan 17 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6075	0.5498	0.6667	1.0373	1.5840
0	0.5680	0.5265	0.6322	0.9846	1.4495
15	0.7686	0.7201	0.8513	1.2519	1.6655
30	1.3543	1.2521	1.4576	1.8379	2.3491
45	2.0981	1.9662	2.1184	2.4755	2.9985



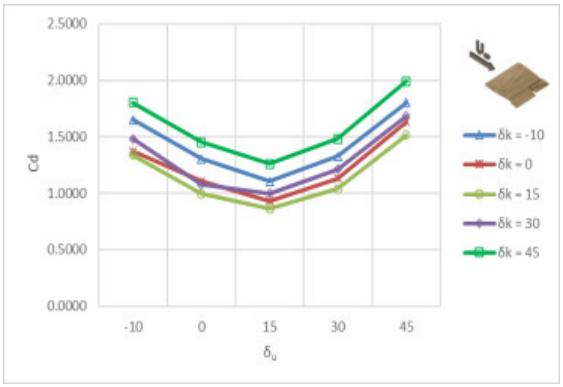
f. Kecepatan 17 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.4003	1.6544	2.1112	3.0106	3.5627
0	1.8029	2.0207	2.5111	3.3227	3.9186
15	2.6113	2.8431	3.5431	4.2760	5.0968
30	3.7827	4.0428	4.6696	5.4346	6.1727
45	4.9730	5.2079	5.6015	6.3896	7.5714



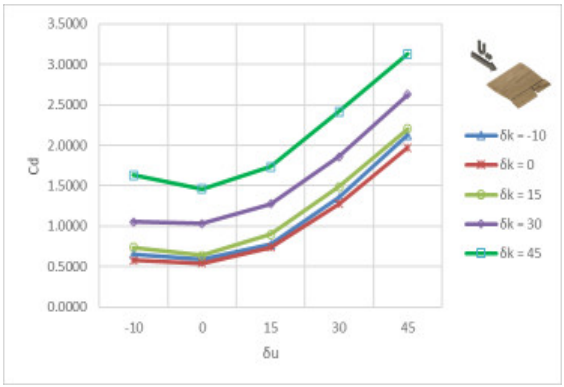
g. Kecepatan 15 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6513	1.3705	1.3399	1.4822	1.8049
0	1.3050	1.1067	0.9951	1.0779	1.4515
15	1.1069	0.9325	0.8610	0.9998	1.2614
30	1.3269	1.1309	1.0397	1.2132	1.4843
45	1.8051	1.6341	1.5173	1.6874	1.9931



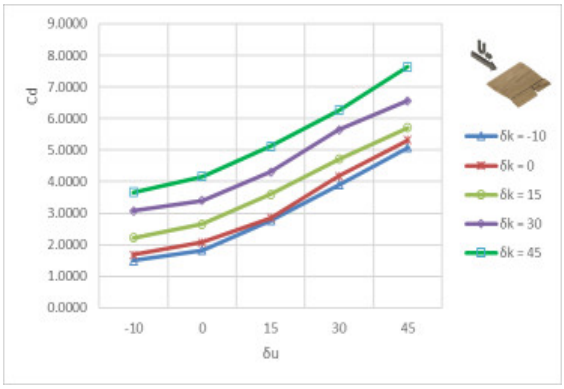
h. Kecepatan 15 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6577	0.5760	0.7363	1.0528	1.6340
0	0.5893	0.5401	0.6403	1.0302	1.4611
15	0.7749	0.7389	0.9001	1.2728	1.7329
30	1.3551	1.2734	1.4853	1.8565	2.4166
45	2.1293	1.9741	2.2063	2.6310	3.1282



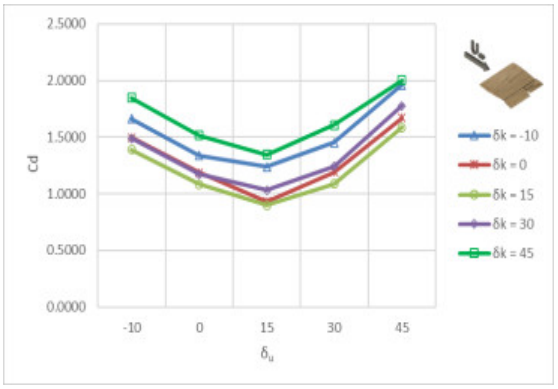
i. Kecepatan 15 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.4965	1.6861	2.2186	3.0787	3.6662
0	1.8236	2.0786	2.6466	3.3990	4.1607
15	2.7705	2.8536	3.5952	4.3006	5.1256
30	3.8936	4.1783	4.7173	5.6417	6.2577
45	5.0837	5.3106	5.7052	6.5572	7.6331



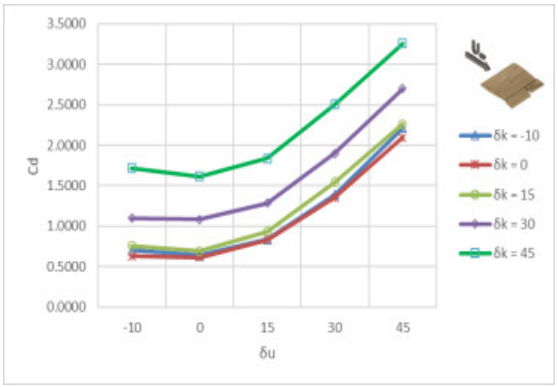
j. Kecepatan 12 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6642	1.4971	1.3905	1.4910	1.8471
0	1.3387	1.1879	1.0843	1.1712	1.5162
15	1.2395	0.9325	0.8988	1.0308	1.3451
30	1.4525	1.1900	1.0881	1.2420	1.6073
45	1.9608	1.6714	1.5843	1.7769	2.0044



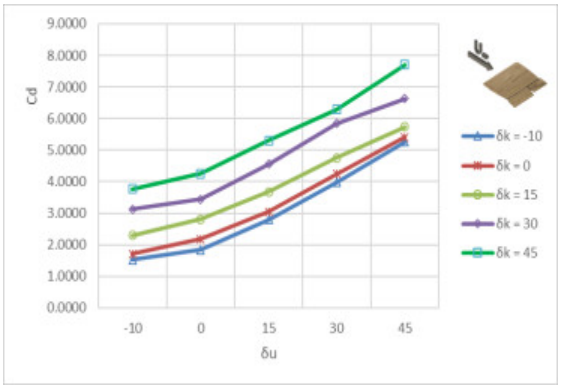
k. Kecepatan 12 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.7033	0.6270	0.7598	1.1014	1.7174
0	0.6375	0.6125	0.6921	1.0842	1.6175
15	0.8379	0.8326	0.9340	1.2846	1.8385
30	1.3900	1.3541	1.5457	1.8984	2.5037
45	2.2179	2.0965	2.2641	2.7014	3.2615



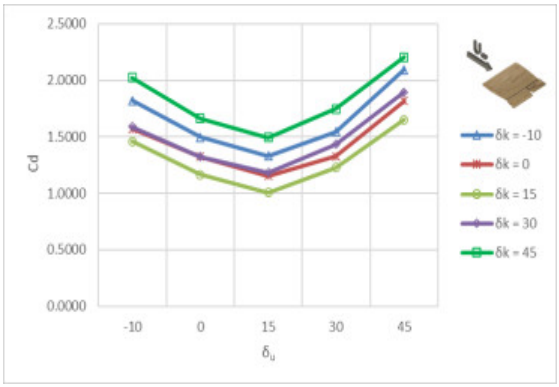
l. Kecepatan 12 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.5260	1.7120	2.2938	3.1285	3.7722
0	1.8440	2.1864	2.8113	3.4342	4.2597
15	2.7982	3.0521	3.6709	4.5551	5.2986
30	3.9742	4.2454	4.7485	5.8419	6.2822
45	5.2661	5.4065	5.7430	6.6340	7.7044



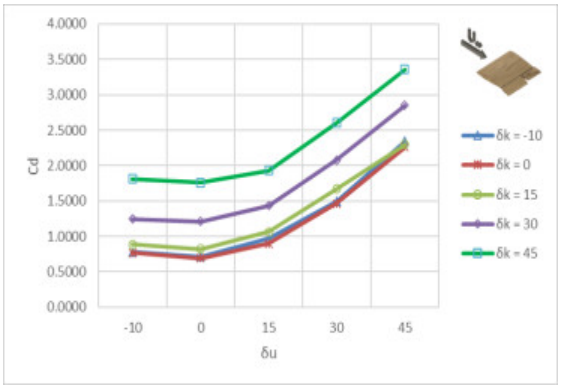
m. Kecepatan 9 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.8209	1.5697	1.4607	1.5905	2.0262
0	1.4983	1.3248	1.1672	1.3223	1.6638
15	1.3309	1.1536	1.0074	1.1834	1.4949
30	1.5469	1.3290	1.2270	1.4345	1.7482
45	2.0971	1.8178	1.6523	1.8955	2.2074



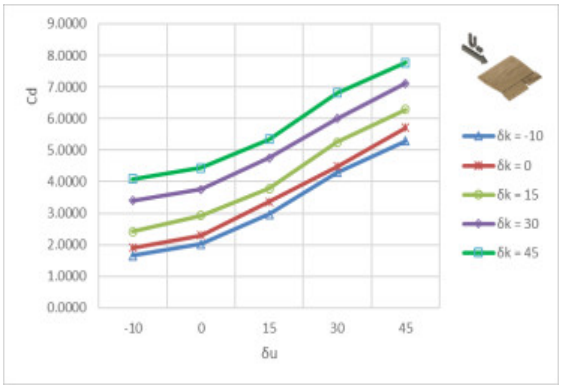
n. Kecepatan 9 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.7760	0.7693	0.8866	1.2429	1.8125
0	0.7144	0.6922	0.8210	1.2107	1.7557
15	0.9675	0.8955	1.0617	1.4365	1.9274
30	1.4898	1.4643	1.6675	2.0778	2.6019
45	2.3421	2.2576	2.2960	2.8524	3.3579



o. Kecepatan 9 m/s, (α= 15˚)

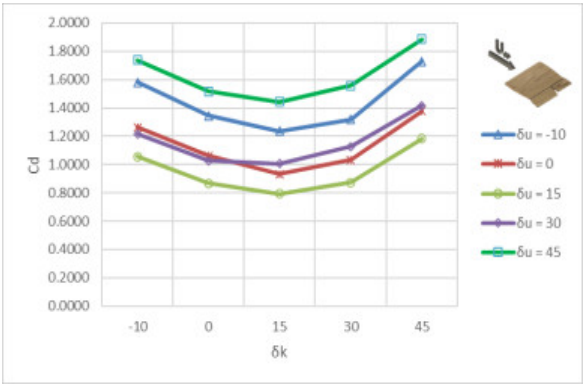
Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6490	1.9086	2.4181	3.3946	4.0789
0	2.0166	2.3038	2.9303	3.7501	4.4434
15	2.9647	3.3657	3.7876	4.7515	5.3479
30	4.2937	4.4767	5.2474	6.0016	6.8142
45	5.2841	5.7063	6.2902	7.1129	7.7654



2. Tabel dan grafik hubungan koefisien *drag flap* kendali terhadap *flap* utama

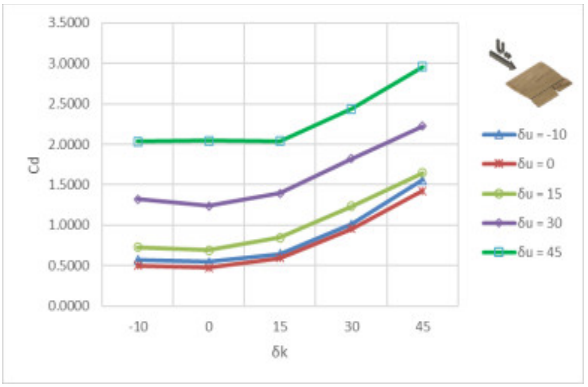
a. Kecepatan 20 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.5808	1.2619	1.0575	1.2167	1.7378
0	1.3443	1.0627	0.8663	1.0271	1.5176
15	1.2353	0.9323	0.7939	1.0074	1.4440
30	1.3203	1.0324	0.8723	1.1284	1.5577
45	1.7308	1.3786	1.1818	1.4157	1.8866



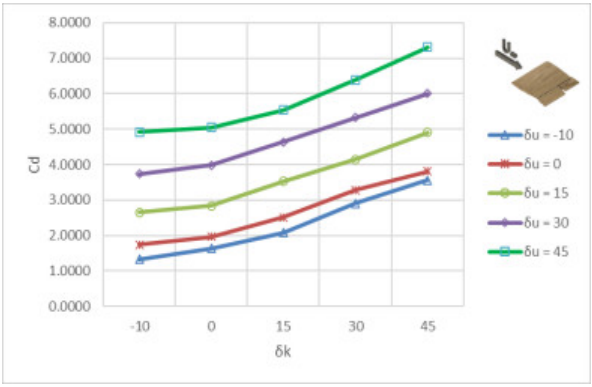
b. Kecepatan 20 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.5714	0.5012	0.7287	1.3238	2.0369
0	0.5485	0.4750	0.6928	1.2414	2.0447
15	0.6437	0.5929	0.8445	1.3958	2.0376
30	1.0120	0.9526	1.2347	1.8219	2.4386
45	1.5587	1.4256	1.6448	2.2243	2.9576



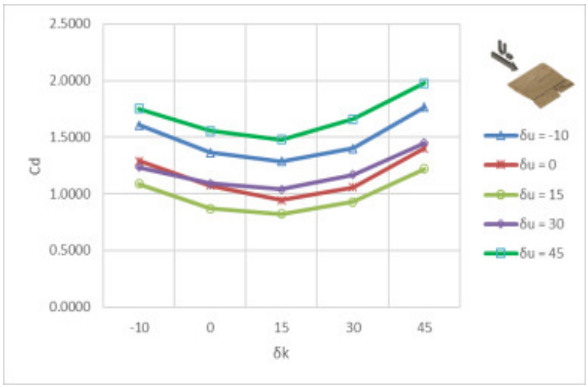
c. Kecepatan 20 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.3363	1.7375	2.6476	3.7369	4.9176
0	1.6334	1.9616	2.8361	3.9784	5.0514
15	2.0817	2.5087	3.5281	4.6406	5.5367
30	2.9113	3.2858	4.1454	5.3234	6.3861
45	3.5577	3.8112	4.9069	6.0109	7.3124



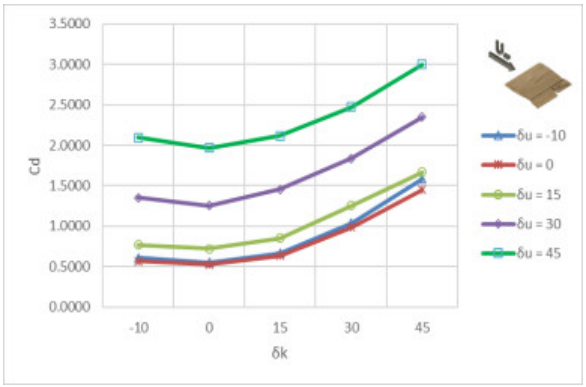
d. Kecepatan 17 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6087	1.2919	1.0864	1.2340	1.7520
0	1.3660	1.0723	0.8719	1.0917	1.5550
15	1.2860	0.9441	0.8219	1.0397	1.4808
30	1.4001	1.0579	0.9307	1.1699	1.6597
45	1.7685	1.4014	1.2192	1.4498	1.9770



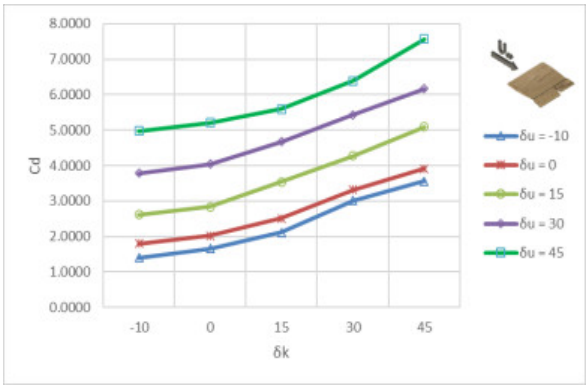
e. Kecepatan 17 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6075	0.5680	0.7686	1.3543	2.0981
0	0.5498	0.5265	0.7201	1.2521	1.9662
15	0.6667	0.6322	0.8513	1.4576	2.1184
30	1.0373	0.9846	1.2519	1.8379	2.4755
45	1.5840	1.4495	1.6655	2.3491	2.9985



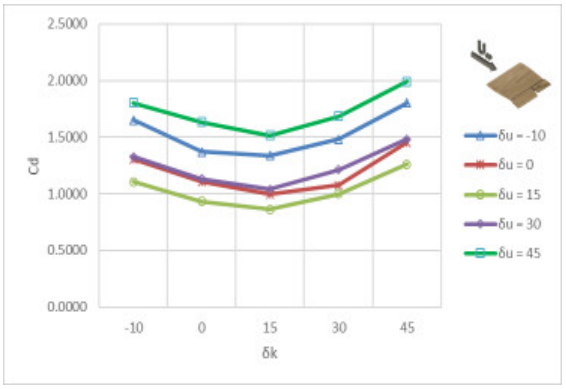
f. Kecepatan 17 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.4003	1.8029	2.6113	3.7827	4.9730
0	1.6544	2.0207	2.8431	4.0428	5.2079
15	2.1112	2.5111	3.5431	4.6696	5.6015
30	3.0106	3.3227	4.2760	5.4346	6.3896
45	3.5627	3.9186	5.0968	6.1727	7.5714



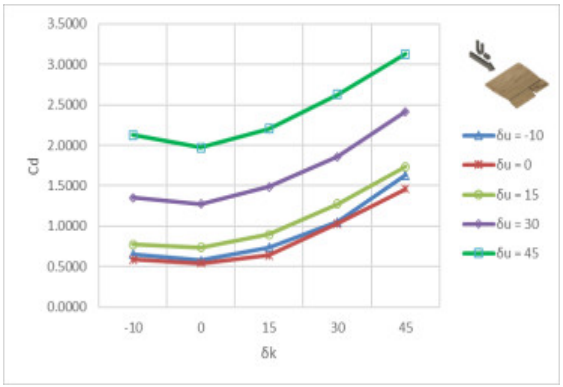
g. Kecepatan 15 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6513	1.3050	1.1069	1.3269	1.8051
0	1.3705	1.1067	0.9325	1.1309	1.6341
15	1.3399	0.9951	0.8610	1.0397	1.5173
30	1.4822	1.0779	0.9998	1.2132	1.6874
45	1.8049	1.4515	1.2614	1.4843	1.9931



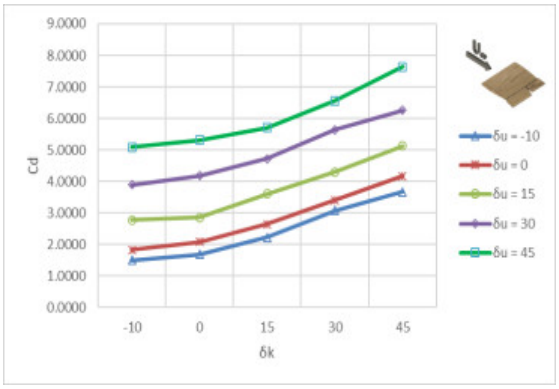
h. Kecepatan 15 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6577	0.5893	0.7749	1.3551	2.1293
0	0.5760	0.5401	0.7389	1.2734	1.9741
15	0.7363	0.6403	0.9001	1.4853	2.2063
30	1.0528	1.0302	1.2728	1.8565	2.6310
45	1.6340	1.4611	1.7329	2.4166	3.1282



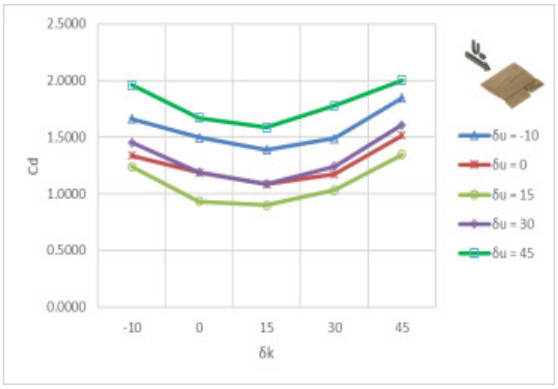
i. Kecepatan 15 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.4965	1.8236	2.7705	3.8936	5.0837
0	1.6861	2.0786	2.8536	4.1783	5.3106
15	2.2186	2.6466	3.5952	4.7173	5.7052
30	3.0787	3.3990	4.3006	5.6417	6.5572
45	3.6662	4.1607	5.1256	6.2577	7.6331



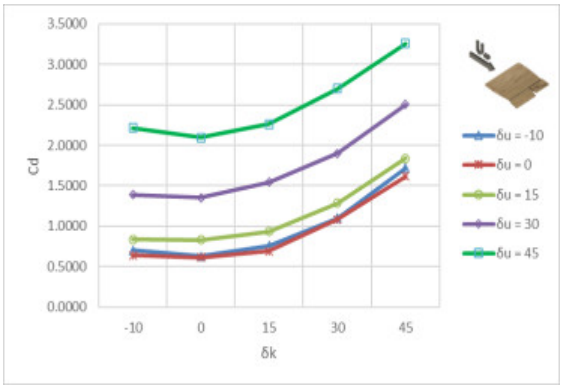
j. Kecepatan 12 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6642	1.3387	1.2395	1.4525	1.9608
0	1.4971	1.1879	0.9325	1.1900	1.6714
15	1.3905	1.0843	0.8988	1.0881	1.5843
30	1.4910	1.1712	1.0308	1.2420	1.7769
45	1.8471	1.5162	1.3451	1.6073	2.0044



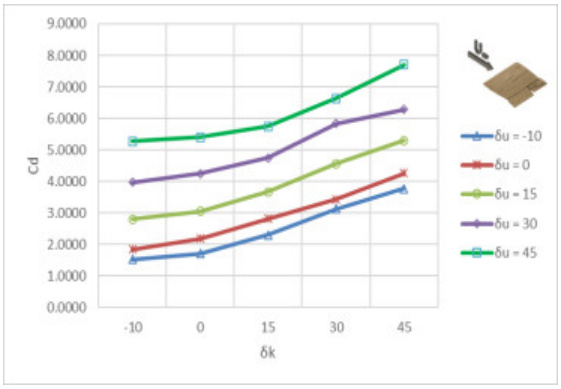
k. Kecepatan 12 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.7033	0.6375	0.8379	1.3900	2.2179
0	0.6270	0.6125	0.8326	1.3541	2.0965
15	0.7598	0.6921	0.9340	1.5457	2.2641
30	1.1014	1.0842	1.2846	1.8984	2.7014
45	1.7174	1.6175	1.8385	2.5037	3.2615



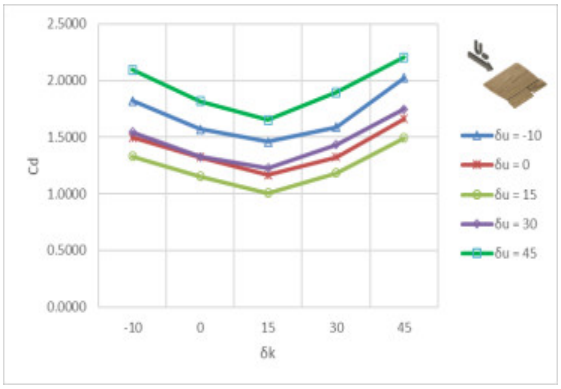
l. Kecepatan 12 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.5260	1.8440	2.7982	3.9742	5.2661
0	1.7120	2.1864	3.0521	4.2454	5.4065
15	2.2938	2.8113	3.6709	4.7485	5.7430
30	3.1285	3.4342	4.5551	5.8419	6.6340
45	3.7722	4.2597	5.2986	6.2822	7.7044



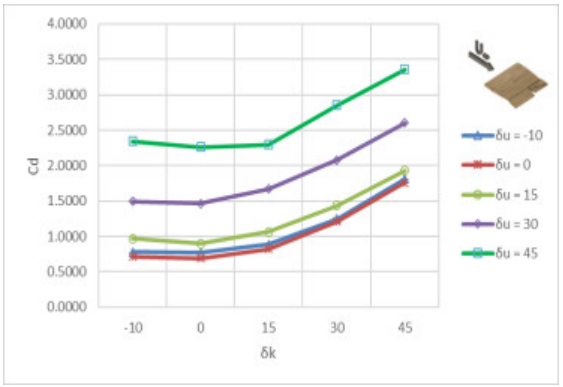
m. Kecepatan 9 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.8209	1.4983	1.3309	1.5469	2.0971
0	1.5697	1.3248	1.1536	1.3290	1.8178
15	1.4607	1.1672	1.0074	1.2270	1.6523
30	1.5905	1.3223	1.1834	1.4345	1.8955
45	2.0262	1.6638	1.4949	1.7482	2.2074



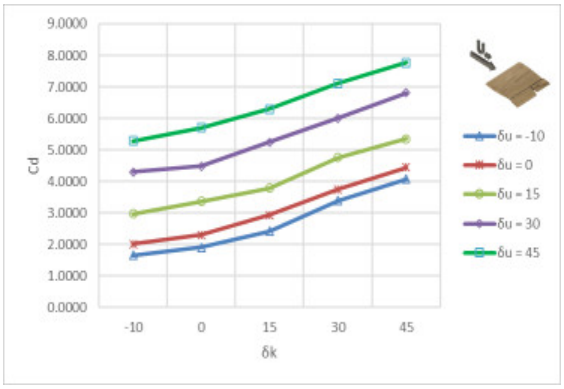
n. Kecepatan 9 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.7760	0.7144	0.9675	1.4898	2.3421
0	0.7693	0.6922	0.8955	1.4643	2.2576
15	0.8866	0.8210	1.0617	1.6675	2.2960
30	1.2429	1.2107	1.4365	2.0778	2.8524
45	1.8125	1.7557	1.9274	2.6019	3.3579



o. Kecepatan 9 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6490	2.0166	2.9647	4.2937	5.2841
0	1.9086	2.3038	3.3657	4.4767	5.7063
15	2.4181	2.9303	3.7876	5.2474	6.2902
30	3.3946	3.7501	4.7515	6.0016	7.1129
45	4.0789	4.4434	5.3479	6.8142	7.7654

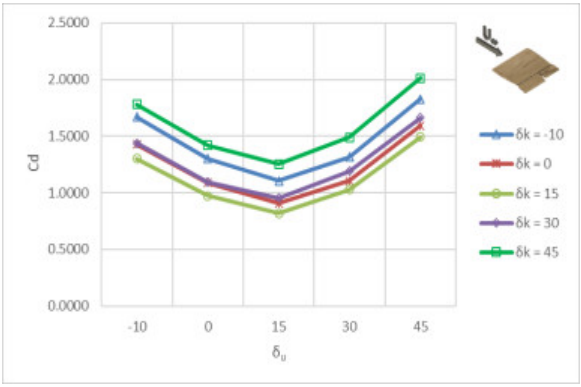


Lampiran 3 Tabel dan grafik hubungan koefisiean *drag* terhadap *flap* secara komputasi

1. Tabel dan grafik hubungan koefisien *drag flap* utama terhadap *flap* kendali

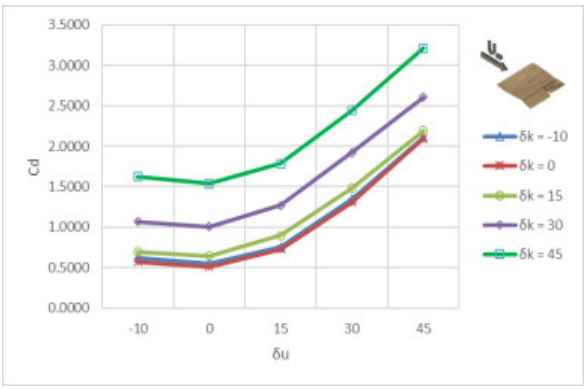
a. Kecepatan 20 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6694	1.4284	1.3028	1.4402	1.7820
0	1.3007	1.0894	0.9746	1.0944	1.4201
15	1.1081	0.9087	0.8203	0.9538	1.2524
30	1.3154	1.1053	1.0279	1.1902	1.4916
45	1.8286	1.5918	1.4923	1.6620	2.0154



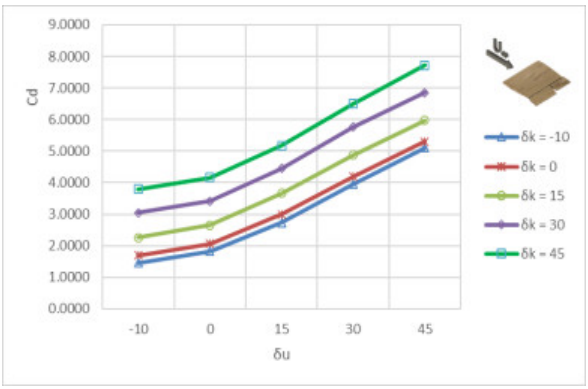
b. Kecepatan 20 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6241	0.5726	0.6948	1.0669	1.6256
0	0.5496	0.5123	0.6428	1.0052	1.5409
15	0.7553	0.7260	0.8996	1.2719	1.7891
30	1.3463	1.3076	1.4839	1.9195	2.4407
45	2.1114	2.0955	2.1927	2.6059	3.2103



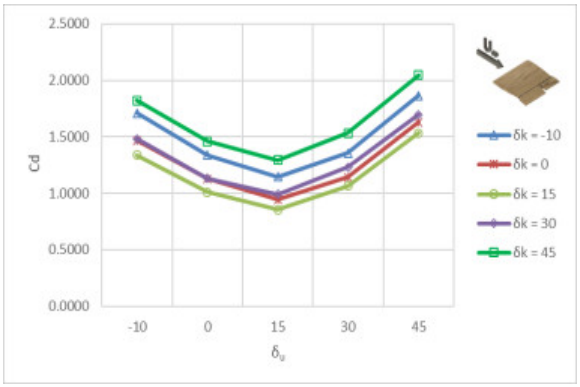
c. Kecepatan 20 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.4644	1.6953	2.2606	3.0450	3.7996
0	1.8206	2.0637	2.6580	3.4155	4.1680
15	2.7273	2.9888	3.6571	4.4453	5.1682
30	3.9534	4.1936	4.8706	5.7572	6.4928
45	5.1041	5.3035	5.9745	6.8564	7.7164



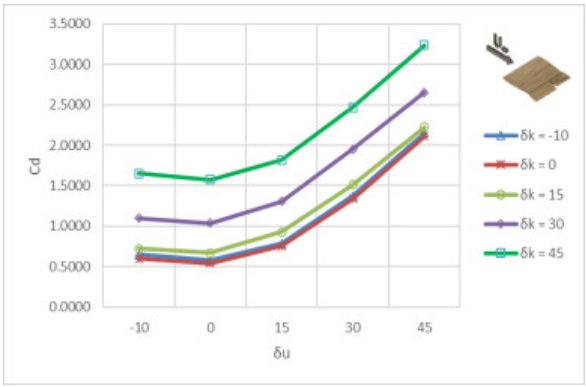
d. Kecepatan 17 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.7111	1.4685	1.3406	1.4813	1.8215
0	1.3390	1.1277	1.0117	1.1335	1.4597
15	1.1467	0.9448	0.8565	0.9917	1.2941
30	1.3569	1.1443	1.0665	1.2300	1.5356
45	1.8672	1.6295	1.5335	1.6982	2.0491



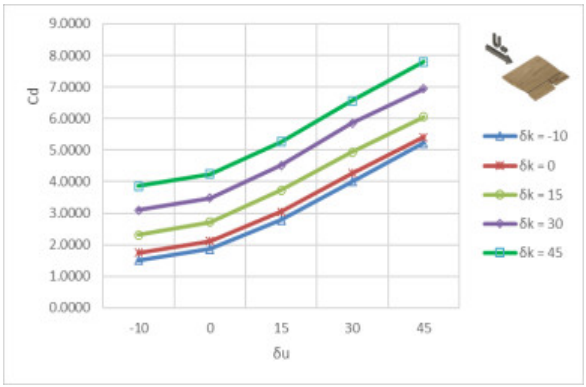
e. Kecepatan 17 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6515	0.6003	0.7239	1.0998	1.6524
0	0.5769	0.5394	0.6703	1.0384	1.5766
15	0.7851	0.7556	0.9290	1.3053	1.8173
30	1.3744	1.3374	1.5114	1.9538	2.4704
45	2.1552	2.1101	2.2239	2.6541	3.2403



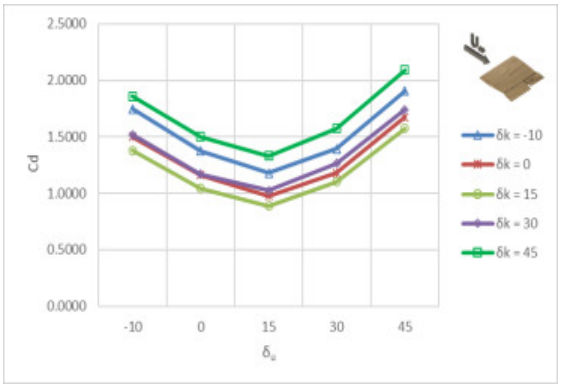
f. Kecepatan 17 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.5106	1.7448	2.3163	3.1039	3.8566
0	1.8691	2.1133	2.7165	3.4801	4.2389
15	2.7862	3.0510	3.7234	4.5150	5.2589
30	4.0087	4.2643	4.9344	5.8544	6.5570
45	5.2211	5.4035	6.0454	6.9405	7.7997



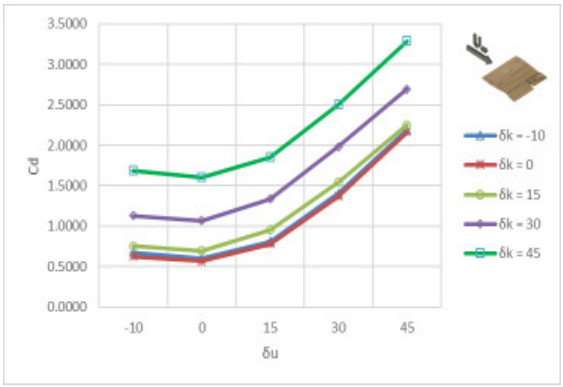
g. Kecepatan 15 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.7467	1.5028	1.3779	1.5186	1.8604
0	1.3744	1.1605	1.0453	1.1682	1.5003
15	1.1809	0.9778	0.8890	1.0263	1.3323
30	1.3948	1.1802	1.1011	1.2658	1.5756
45	1.9054	1.6746	1.5743	1.7398	2.0927



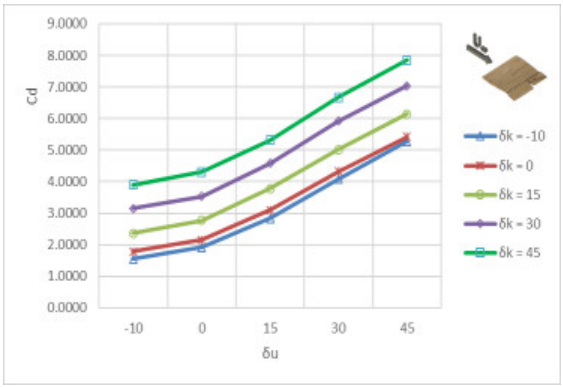
h. Kecepatan 15 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6775	0.6264	0.7517	1.1302	1.6871
0	0.6032	0.5648	0.6967	1.0661	1.6035
15	0.8125	0.7801	0.9574	1.3364	1.8528
30	1.4019	1.3684	1.5439	1.9806	2.5055
45	2.1926	2.1637	2.2537	2.6953	3.2898



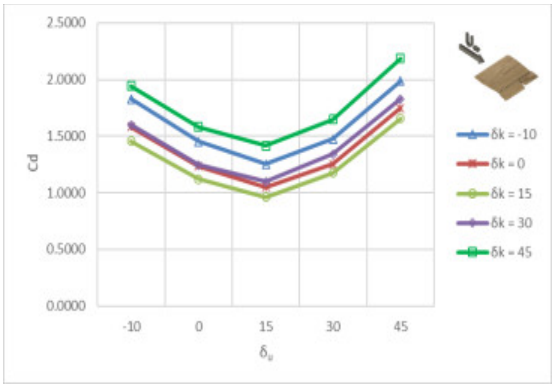
i. Kecepatan 15 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.5518	1.7838	2.3642	3.1526	3.9043
0	1.9124	2.1587	2.7647	3.5355	4.3002
15	2.8392	3.1000	3.7835	4.5862	5.3106
30	4.0798	4.3244	5.0114	5.9166	6.6667
45	5.2776	5.4185	6.1414	7.0401	7.8477



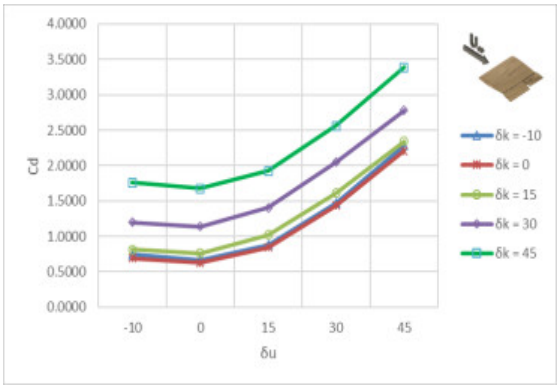
j. Kecepatan 12 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.8293	1.5823	1.4558	1.6005	1.9459
0	1.4540	1.2370	1.1210	1.2467	1.5826
15	1.2546	1.0513	0.9613	1.1007	1.4152
30	1.4741	1.2556	1.1753	1.3415	1.6483
45	1.9894	1.7497	1.6559	1.8303	2.1880



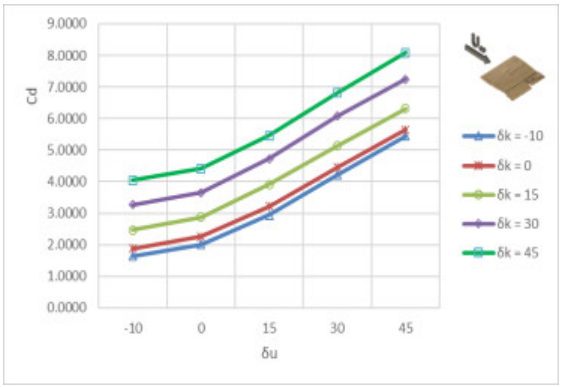
k. Kecepatan 12 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.7409	0.6882	0.8149	1.1994	1.7596
0	0.6650	0.6257	0.7595	1.1361	1.6768
15	0.8760	0.8421	1.0192	1.4042	1.9215
30	1.4671	1.4312	1.6111	2.0494	2.5640
45	2.2854	2.2056	2.3453	2.7802	3.3869



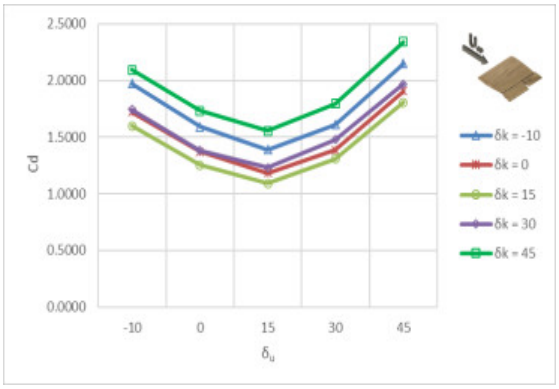
l. Kecepatan 12 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6424	1.8789	2.4667	3.2677	4.0462
0	2.0051	2.2545	2.8740	3.6524	4.4162
15	2.9478	3.2198	3.9110	4.7214	5.4642
30	4.2086	4.4490	5.1294	6.0763	6.8070
45	5.4526	5.6495	6.3139	7.2414	8.0904



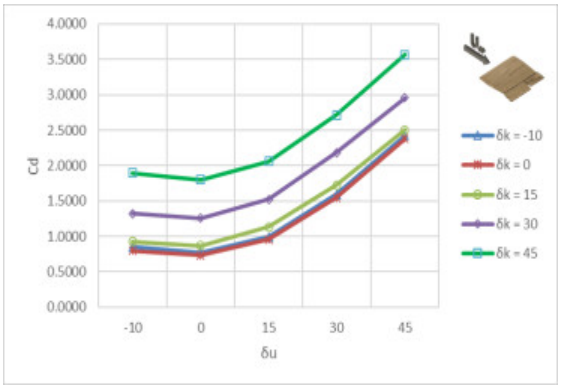
m. Kecepatan 9 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.9747	1.7227	1.5991	1.7456	2.0962
0	1.5928	1.3731	1.2545	1.3849	1.7330
15	1.3913	1.1830	1.0921	1.2321	1.5572
30	1.6125	1.3884	1.3075	1.4798	1.7978
45	2.1494	1.9068	1.8070	1.9713	2.3429



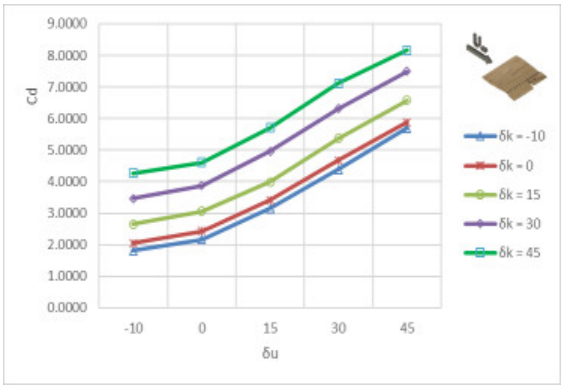
n. Kecepatan 9 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.8517	0.7967	0.9268	1.3214	1.8968
0	0.7707	0.7311	0.8680	1.2549	1.7987
15	0.9904	0.9532	1.1341	1.5245	2.0606
30	1.5939	1.5468	1.7241	2.1839	2.7121
45	2.4263	2.3811	2.5037	2.9578	3.5647



o. Kecepatan 9 m/s, (α= 15˚)

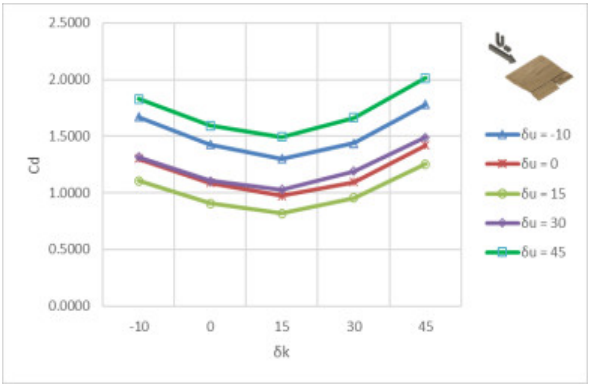
Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.8103	2.0427	2.6575	3.4678	4.2626
0	2.1703	2.4274	3.0591	3.8679	4.6055
15	3.1462	3.4155	3.9855	4.9570	5.7084
30	4.3902	4.6787	5.3732	6.3147	7.1111
45	5.6917	5.8858	6.5789	7.4946	8.1679



2. Tabel dan grafik hubungan koefisien *drag flap* kendali terhadap *flap* utama

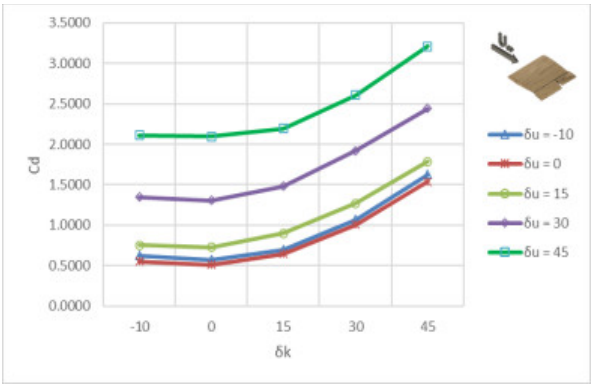
a. Kecepatan 20 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6694	1.3007	1.1081	1.3154	1.8286
0	1.4284	1.0894	0.9087	1.1053	1.5918
15	1.3028	0.9746	0.8203	1.0279	1.4923
30	1.4402	1.0944	0.9538	1.1902	1.6620
45	1.7820	1.4201	1.2524	1.4916	2.0154



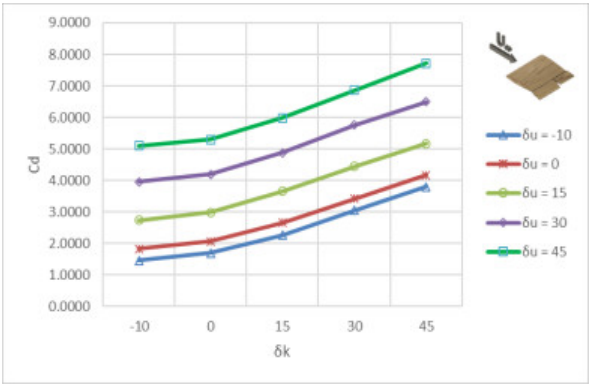
b. Kecepatan 20 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6241	0.5496	0.7553	1.3463	2.1114
0	0.5726	0.5123	0.7260	1.3076	2.0955
15	0.6948	0.6428	0.8996	1.4839	2.1927
30	1.0669	1.0052	1.2719	1.9195	2.6059
45	1.6256	1.5409	1.7891	2.4407	3.2103



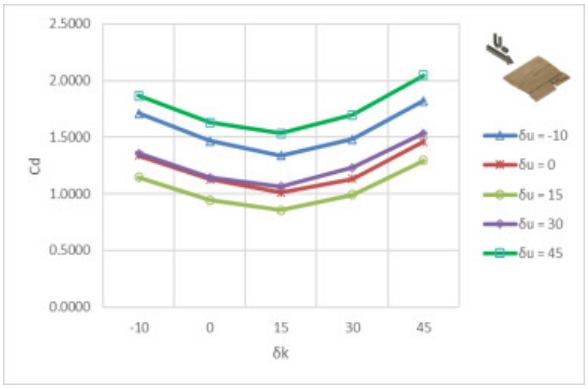
c. Kecepatan 20 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.4644	1.8206	2.7273	3.9534	5.1041
0	1.6953	2.0637	2.9888	4.1936	5.3035
15	2.2606	2.6580	3.6571	4.8706	5.9745
30	3.0450	3.4155	4.4453	5.7572	6.8564
45	3.7996	4.1680	5.1682	6.4928	7.7164



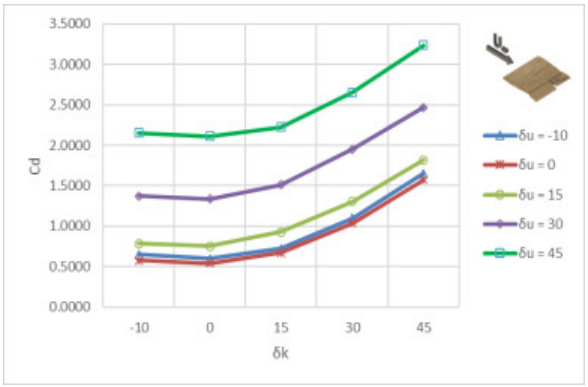
d. Kecepatan 17 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.7111	1.3390	1.1467	1.3569	1.8672
0	1.4685	1.1277	0.9448	1.1443	1.6295
15	1.3406	1.0117	0.8565	1.0665	1.5335
30	1.4813	1.1335	0.9917	1.2300	1.6982
45	1.8215	1.4597	1.2941	1.5356	2.0491



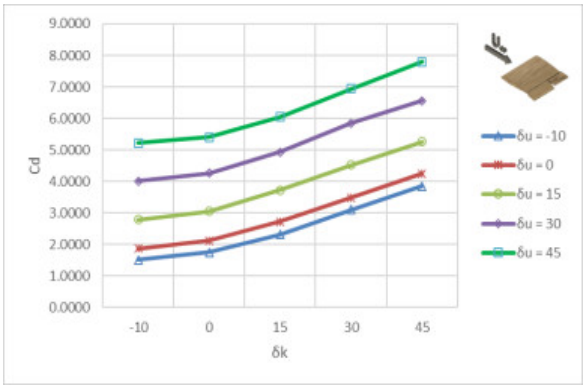
e. Kecepatan 17 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6515	0.5769	0.7851	1.3744	2.1552
0	0.6003	0.5394	0.7556	1.3374	2.1101
15	0.7239	0.6703	0.9290	1.5114	2.2239
30	1.0998	1.0384	1.3053	1.9538	2.6541
45	1.6524	1.5766	1.8173	2.4704	3.2403



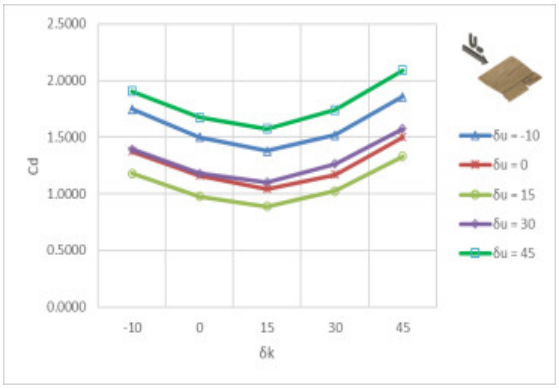
f. Kecepatan 17 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.5106	1.8691	2.7862	4.0087	5.2211
0	1.7448	2.1133	3.0510	4.2643	5.4035
15	2.3163	2.7165	3.7234	4.9344	6.0454
30	3.1039	3.4801	4.5150	5.8544	6.9405
45	3.8566	4.2389	5.2589	6.5570	7.7997



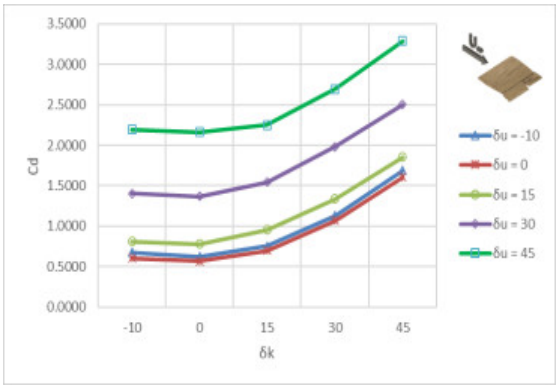
g. Kecepatan 15 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.7467	1.3744	1.1809	1.3948	1.9054
0	1.5028	1.1605	0.9778	1.1802	1.6746
15	1.3779	1.0453	0.8890	1.1011	1.5743
30	1.5186	1.1682	1.0263	1.2658	1.7398
45	1.8604	1.5003	1.3323	1.5756	2.0927



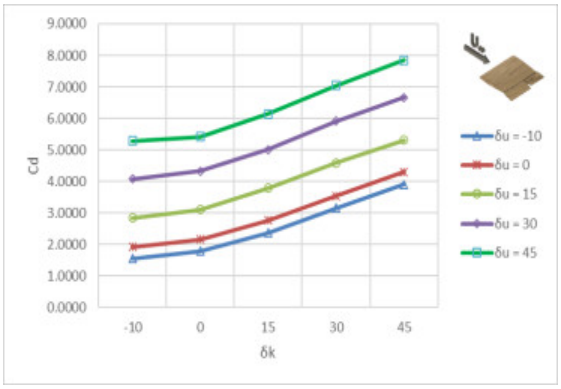
h. Kecepatan 15 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.6775	0.6032	0.8125	1.4019	2.1926
0	0.6264	0.5648	0.7801	1.3684	2.1637
15	0.7517	0.6967	0.9574	1.5439	2.2537
30	1.1302	1.0661	1.3364	1.9806	2.6953
45	1.6871	1.6035	1.8528	2.5055	3.2898



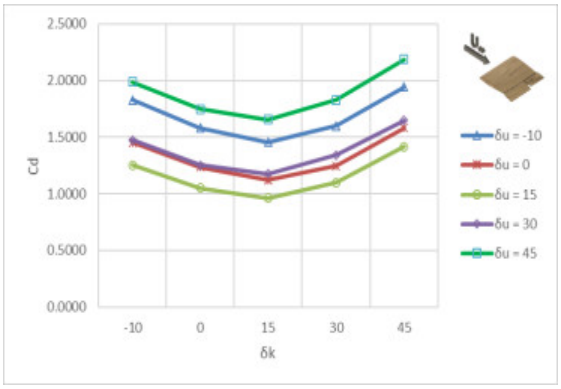
i. Kecepatan 15 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.5518	1.9124	2.8392	4.0798	5.2776
0	1.7838	2.1587	3.1000	4.3244	5.4185
15	2.3642	2.7647	3.7835	5.0114	6.1414
30	3.1526	3.5355	4.5862	5.9166	7.0401
45	3.9043	4.3002	5.3106	6.6667	7.8477



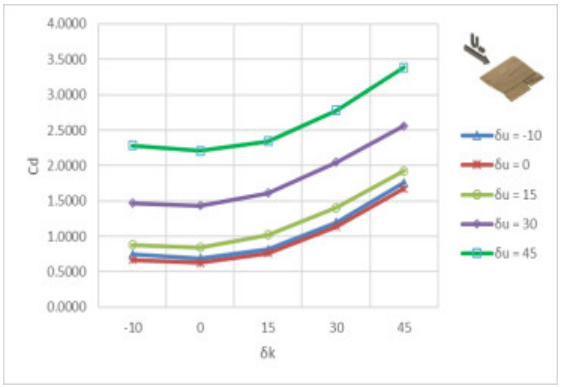
j. Kecepatan 12 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.8293	1.4540	1.2546	1.4741	1.9894
0	1.5823	1.2370	1.0513	1.2556	1.7497
15	1.4558	1.1210	0.9613	1.1753	1.6559
30	1.6005	1.2467	1.1007	1.3415	1.8303
45	1.9459	1.5826	1.4152	1.6483	2.1880



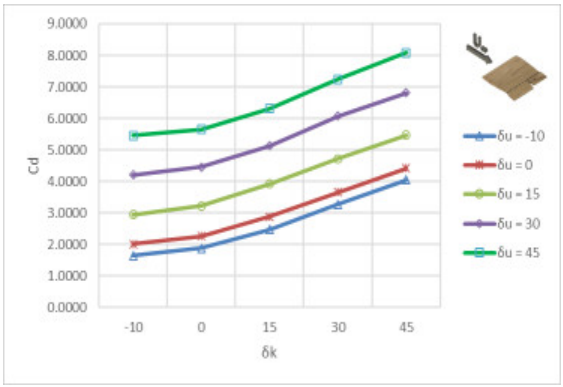
k. Kecepatan 12 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.7409	0.6650	0.8760	1.4671	2.2854
0	0.6882	0.6257	0.8421	1.4312	2.2056
15	0.8149	0.7595	1.0192	1.6111	2.3453
30	1.1994	1.1361	1.4042	2.0494	2.7802
45	1.7596	1.6768	1.9215	2.5640	3.3869



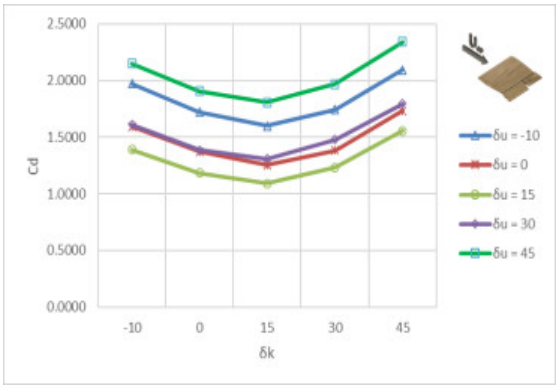
l. Kecepatan 12 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.6424	2.0051	2.9478	4.2086	5.4526
0	1.8789	2.2545	3.2198	4.4490	5.6495
15	2.4667	2.8740	3.9110	5.1294	6.3139
30	3.2677	3.6524	4.7214	6.0763	7.2414
45	4.0462	4.4162	5.4642	6.8070	8.0904



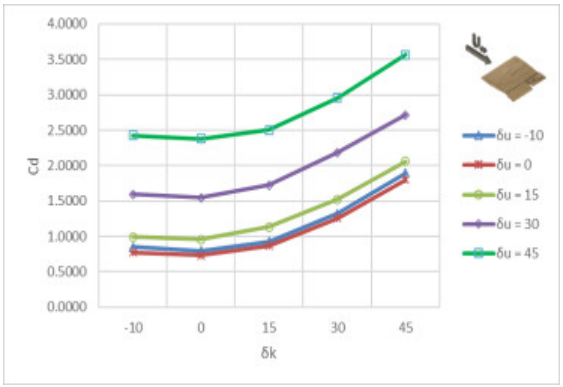
m. Kecepatan 9 m/s, (α= -10˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.9747	1.5928	1.3913	1.6125	2.1494
0	1.7227	1.3731	1.1830	1.3884	1.9068
15	1.5991	1.2545	1.0921	1.3075	1.8070
30	1.7456	1.3849	1.2321	1.4798	1.9713
45	2.0962	1.7330	1.5572	1.7978	2.3429



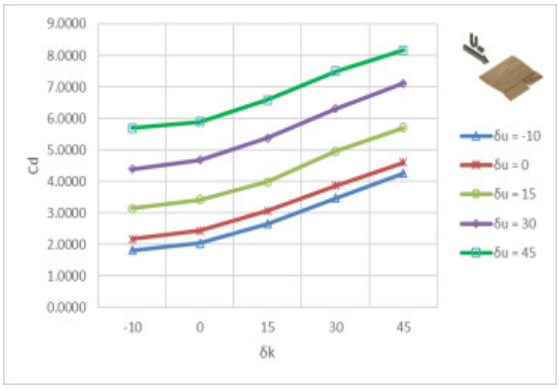
n. Kecepatan 9 m/s, (α= 0˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	0.8517	0.7707	0.9904	1.5939	2.4263
0	0.7967	0.7311	0.9532	1.5468	2.3811
15	0.9268	0.8680	1.1341	1.7241	2.5037
30	1.3214	1.2549	1.5245	2.1839	2.9578
45	1.8968	1.7987	2.0606	2.7121	3.5647



o. Kecepatan 9 m/s, (α= 15˚)

Sudut serang flap utama /δ_u (˚)	Koefisien *drag* (Cd)				
	Sudut serang flap kendali/δ_k (˚)				
	-10	0	15	30	45
-10	1.8103	2.1703	3.1462	4.3902	5.6917
0	2.0427	2.4274	3.4155	4.6787	5.8858
15	2.6575	3.0591	3.9855	5.3732	6.5789
30	3.4678	3.8679	4.9570	6.3147	7.4946
45	4.2626	4.6055	5.7084	7.1111	8.1679



Lampiran 4 Tabel hasil pengamatan

1. Fu= -10˚ dan Fk= -10˚

V (m/s)	-10	0	15
6	0.1768	0.0805	0.1610
9	0.3392	0.1446	0.3072
12	0.5512	0.2329	0.5054
15	0.8545	0.3404	0.7744
17	1.0693	0.4038	0.9308
20	1.4543	0.5257	1.2294
22	1.7582	0.6193	1.4605

2. Fu= -10˚ dan Fk= 0˚

V (m/s)	-10	0	15
6	0.1465	0.0896	0.2408
9	0.2721	0.1652	0.4505
12	0.4605	0.2517	0.7597
15	0.6934	0.3810	1.1481
17	0.8548	0.4431	1.4033
20	1.1365	0.5922	1.9152
22	1.3330	0.6905	2.2837

3. Fu= -10˚ dan Fk= 15˚

V (m/s)	-10	0	15
6	0.1589	0.1182	0.3089
9	0.2963	0.2316	0.6324
12	0.4938	0.3648	1.0362
15	0.7671	0.5448	1.5932
17	0.9307	0.6895	2.0011
20	1.2147	0.9310	2.6784
22	1.4517	1.0898	3.1405

4. Fu= -10˚ dan Fk= 30˚

V (m/s)	-10	0	15
6	0.1589	0.1182	0.3089
9	0.2963	0.2316	0.6324
12	0.4938	0.3648	1.0362
15	0.7671	0.5448	1.5932
17	0.9307	0.6895	2.0011
20	1.2147	0.9310	2.6784
22	1.4517	1.0898	3.1405

5. Fu= -10˚ dan Fk= 45˚

V (m/s)	-10	0	15
6	0.1842	0.1707	0.3708
9	0.3775	0.3377	0.7599
12	0.6117	0.5688	1.2493
15	0.9341	0.8456	1.8973
17	1.1755	1.0529	2.3681
20	1.5924	1.4340	3.2731
22	1.8217	1.6804	3.9433

6. Fu= 0˚ dan Fk= -10˚

V (m/s)	-10	0	15
6	0.1477	0.0770	0.1895
9	0.2791	0.1331	0.3757
12	0.4434	0.2111	0.6107
15	0.6753	0.3050	0.9437
17	0.8587	0.3775	1.1984
20	1.1609	0.4611	1.5985
22	1.3648	0.5473	1.9043

7. Fu= 0˚ dan Fk= 0˚

V (m/s)	-10	0	15
6	0.1333	0.0736	0.2196
9	0.2468	0.1290	0.4292
12	0.3934	0.2029	0.7241
15	0.5727	0.2795	1.0757
17	0.7128	0.3499	1.3432
20	0.9777	0.4370	1.8047
	1.1635	0.5050	2.1670

8. Fu= 0˚ dan Fk= 15˚

V (m/s)	-10	0	15
6	0.1158	0.0835	0.2638
9	0.2175	0.1529	0.5459
12	0.3591	0.2292	0.9311
15	0.5150	0.3313	1.3696
17	0.6275	0.4202	1.6691
20	0.8577	0.5455	2.3080
22	0.9760	0.6407	2.7449

9. Fu= 0° dan Fk= 30°

V (m/s)	-10	0	15
6	0.1340	0.1130	0.3289
9	0.2463	0.2256	0.6986
12	0.3879	0.3591	1.1374
15	0.5578	0.5331	1.7590
17	0.7032	0.6545	2.2086
20	0.9498	0.8764	3.0229
22	1.1413	1.0529	3.4849

10. Fu= 0° dan Fk= 45°

V (m/s)	-10	0	15
6	0.1550	0.1588	0.3979
9	0.3100	0.3271	0.8278
12	0.5022	0.5357	1.4108
15	0.7512	0.7561	2.1532
17	0.9315	0.9635	2.6047
20	1.2683	1.3116	3.5063
22	1.4240	1.5650	4.2210

11. Fu= 15° dan Fk= -10°

V (m/s)	-10	0	15
6	0.1276	0.0917	0.2802
9	0.2479	0.1802	0.5523
12	0.4105	0.2775	0.9268
15	0.5728	0.4010	1.4338
17	0.7221	0.5109	1.7357
20	0.9729	0.6704	2.4358
22	1.1545	0.7840	2.8547

12. Fu= 15° dan Fk= 0°

V (m/s)	-10	0	15
6	0.1102	0.0888	0.2998
9	0.2149	0.1668	0.6270
12	0.3257	0.2757	1.0108
15	0.4826	0.3824	1.4767
17	0.5796	0.4787	1.8898
20	0.7970	0.6374	2.6092
22	0.9608	0.7271	3.1496

13. Fu= 15° dan Fk= 15°

V (m/s)	-10	0	15
6	0.1081	0.1062	0.3627
9	0.1877	0.1978	0.7056
12	0.2977	0.3093	1.2158
15	0.4456	0.4658	1.8605
17	0.5463	0.5658	2.3551
20	0.7304	0.7770	3.2459
22	0.8363	0.9311	3.8205

14. Fu= 15° dan Fk= 30°

V (m/s)	-10	0	15
6	0.1165	0.1403	0.4405
9	0.2205	0.2676	0.8852
12	0.3414	0.4255	1.5086
15	0.5174	0.6587	2.2255
17	0.6187	0.8322	2.8422
20	0.8025	1.1359	3.8138
22	0.9596	1.3134	4.5552

15. Fu= 15° dan Fk= 45°

V (m/s)	-10	0	15
6	0.1476	0.1855	0.4866
9	0.2785	0.3591	0.9963
12	0.4455	0.6089	1.7549
15	0.6528	0.8968	2.6525
17	0.8104	1.1071	3.3879
20	1.0873	1.5132	4.5144
22	1.2522	1.8231	5.2732

16. Fu= 30° dan Fk= -10°

V (m/s)	-10	0	15
6	0.1485	0.1401	0.3835
9	0.2882	0.2775	0.7999
12	0.4811	0.4604	1.3163
15	0.6867	0.7013	2.0149
17	0.8202	0.9002	2.5144
20	1.1194	1.2179	3.4379
22	1.3430	1.3855	4.1276

17. Fu= 30° dan Fk= 0°

V (m/s)	-10	0	15
6	0.1268	0.1447	0.3883
9	0.2476	0.2728	0.8340
12	0.3941	0.4485	1.4061
15	0.5852	0.6590	2.1623
17	0.7257	0.8323	2.6872
20	0.9450	1.1421	3.6601
22	1.1236	1.3714	4.3774

18. Fu= 30° dan Fk= 15°

V (m/s)	-10	0	15
6	0.1239	0.1512	0.4646
9	0.2286	0.3106	0.9776
12	0.3604	0.5119	1.5727
15	0.5472	0.7687	2.4412
17	0.6911	0.9689	3.1039
20	0.9268	1.2842	4.2694
22	1.0591	1.5327	5.0914

19. Fu= 30° dan Fk= 30°

V (m/s)	-10	0	15
6	0.1367	0.1938	0.5241
9	0.2672	0.3871	1.1181
12	0.4113	0.6287	1.9349
15	0.6278	0.9607	2.9196
17	0.7776	1.2217	3.6123
20	1.0381	1.6762	4.8975
22	1.2354	1.9793	5.8740

20. Fu= 30° dan Fk= 45°

V (m/s)	-10	0	15
6	0.1688	0.2310	0.6255
9	0.3257	0.4847	1.2695
12	0.5323	0.8292	2.0807
15	0.7681	1.2506	3.2384
17	0.9637	1.5614	4.1030
20	1.3025	2.0463	5.5300
22	1.5277	2.4653	6.5888

21. Fu= 45° dan Fk= -10°

V (m/s)	-10	0	15
6	0.1976	0.2180	0.4733
9	0.3907	0.4363	0.9844
12	0.6494	0.7346	1.7441
15	0.9342	1.1019	2.6308
17	1.1645	1.3946	3.3055
20	1.5988	1.8740	4.5242
22	1.9270	2.2307	5.2532

22. Fu= 45° dan Fk= 0°

V (m/s)	-10	0	15
6	0.1788	0.2003	0.4945
9	0.3387	0.4206	1.0631
12	0.5536	0.6944	1.7906
15	0.8456	1.0216	2.7482
17	1.0336	1.3069	3.4617
20	1.3962	1.8811	4.6473
22	1.6092	2.2343	5.3413

23. Fu= 45° dan Fk= 15°

V (m/s)	-10	0	15
6	0.1657	0.2242	0.5631
9	0.3078	0.4277	1.1719
12	0.5247	0.7499	1.9021
15	0.7852	1.1418	2.9524
17	0.9843	1.4081	3.7233
20	1.3285	1.8746	5.0937
	1.5008	2.2433	6.0538

24. Fu= 45° dan Fk= 30°

V (m/s)	-10	0	15
6	0.1809	0.2536	0.6618
9	0.3531	0.5314	1.3251
12	0.5885	0.8947	2.1972
15	0.8732	1.3615	3.3934
17	1.1032	1.6454	4.2472
20	1.4331	2.2436	5.8753
22	1.6859	2.668517	7.0409

25. Fu= 45° dan Fk= 45°

V (m/s)	-10	0	15
6	0.2170	0.2990	0.6590
9	0.4112	0.6256	1.4467
12	0.6639	1.0802	2.5517
15	1.0314	1.6189	3.9501
17	1.3141	1.9931	5.0327
20	1.7357	2.7210	6.7274
22	2.0197	3.2636	8.0233

Lampitan 5 Tabel hasil perhitungan

1. Fu= -10˚ dan Fk= -10˚

V (m/s)	-10	0	15
6	2.1349	0.9718	1.9450
9	1.8209	0.7760	1.6490
12	1.6642	0.7033	1.5260
15	1.6513	0.6577	1.4965
17	1.6087	0.6075	1.4003
20	1.5808	0.5714	1.3363
22	1.5794	0.5564	1.3120

2. Fu= -10˚ dan Fk= 30˚

V (m/s)	-10	0	15
6	1.8486	0.9566	2.2856
9	1.5697	0.7693	1.9086
12	1.4971	0.6270	1.7120
15	1.3705	0.5760	1.6861
17	1.3660	0.5498	1.6544
20	1.3443	0.5485	1.6334
22	1.3349	0.5115	1.5839

3. Fu= -10˚ dan Fk= 15˚

V (m/s)	-10	0	15
6	1.7692	1.0820	2.9077
9	1.4607	0.8866	2.4181
12	1.3905	0.7598	2.2938
15	1.3399	0.7363	2.2186
17	1.2860	0.6667	2.1112
20	1.2353	0.6437	2.0817
22	1.1975	0.6203	2.0514

4. Fu= -10˚ dan Fk= 30˚

V (m/s)	-10	0	15
6	1.9191	1.4271	3.7307
9	1.5905	1.2429	3.3946
12	1.4910	1.1014	3.1285
15	1.4822	1.0528	3.0787
17	1.4001	1.0373	3.0106
20	1.3203	1.0120	2.9113
22	1.3041	0.9790	2.8212

5. Fu= -10˚ dan Fk= 45˚

V (m/s)	-10	0	15
6	2.2241	2.0615	4.4779
9	2.0262	1.8125	4.0789
12	1.8471	1.7174	3.7722
15	1.8049	1.6340	3.6662
17	1.7685	1.5840	3.5627
20	1.7308	1.5587	3.5577
22	1.6365	1.5095	3.5423

6. Fu= 0˚ dan Fk= -10˚

V (m/s)	-10	0	15
6	1.7840	0.9303	2.2888
9	1.4983	0.7144	2.0166
12	1.3387	0.6375	1.8440
15	1.3050	0.5893	1.8236
17	1.2919	0.5680	1.8029
20	1.2619	0.5012	1.7375
22	1.2260	0.4916	1.7107

7. Fu= 0˚ dan Fk= 0˚

V (m/s)	-10	0	15
6	1.6101	0.8892	2.6522
9	1.3248	0.6922	2.3038
12	1.1879	0.6125	2.1864
15	1.1067	0.5401	2.0786
17	1.0723	0.5265	2.0207
20	1.0627	0.4750	1.9616
	1.0452	0.4537	1.9466

8. Fu= 0˚ dan Fk= 15˚

V (m/s)	-10	0	15
6	1.3984	1.0080	3.1854
9	1.1672	0.8210	2.9303
12	1.0843	0.6921	2.8113
15	0.9951	0.6403	2.6466
17	0.9441	0.6322	2.5111
20	0.9323	0.5929	2.5087
22	0.8767	0.5756	2.4658

9. Fu= 0° dan Fk= 30°

V (m/s)	-10	0	15
6	1.6181	1.3643	3.9720
9	1.3223	1.2107	3.7501
12	1.1712	1.0842	3.4342
15	1.0779	1.0302	3.3990
17	1.0579	0.9846	3.3227
20	1.0324	0.9526	3.2858
22	1.0252	0.9459	3.1305

10. Fu= 0° dan Fk= 45°

V (m/s)	-10	0	15
6	1.8725	1.9181	4.8052
9	1.6638	1.7557	4.4434
12	1.5162	1.6175	4.2597
15	1.4515	1.4611	4.1607
17	1.4014	1.4495	3.9186
20	1.3786	1.4256	3.8112
22	1.2792	1.4059	3.7918

11. Fu= 15° dan Fk= -10°

V (m/s)	-10	0	15
6	1.5412	1.1072	3.3841
9	1.3309	0.9675	2.9647
12	1.2395	0.8379	2.7982
15	1.1069	0.7749	2.7705
17	1.0864	0.7686	2.6113
20	1.0575	0.7287	2.6476
22	1.0371	0.7043	2.5644

12. Fu= 15° dan Fk= 0°

V (m/s)	-10	0	15
6	1.3307	1.0719	3.6213
9	1.1536	0.8955	3.3657
12	0.9833	0.8326	3.0521
15	0.9325	0.7389	2.8536
17	0.8719	0.7201	2.8431
20	0.8663	0.6928	2.8361
22	0.8631	0.6531	2.8293

13. Fu= 15° dan Fk= 15°

V (m/s)	-10	0	15
6	1.3051	1.2823	4.3808
9	1.0074	1.0617	3.7876
12	0.8988	0.9340	3.6709
15	0.8610	0.9001	3.5952
17	0.8219	0.8513	3.5431
20	0.7939	0.8445	3.5281
22	0.7512	0.8364	3.4320

14. Fu= 15° dan Fk= 30°

V (m/s)	-10	0	15
6	1.4075	1.6946	5.3206
9	1.1834	1.4365	4.7515
12	1.0308	1.2846	4.5551
15	0.9998	1.2728	4.3006
17	0.9307	1.2519	4.2760
20	0.8723	1.2347	4.1454
22	0.8620	1.1798	4.0919

15. Fu= 15° dan Fk= 45°

V (m/s)	-10	0	15
6	1.7830	2.2399	5.8773
9	1.4949	1.9274	5.3479
12	1.3451	1.8385	5.2986
15	1.2614	1.7329	5.1256
17	1.2192	1.6655	5.0968
20	1.1818	1.6448	4.9069
22	1.1248	1.6377	4.7369

16. Fu= 30° dan Fk= -10°

V (m/s)	-10	0	15
6	1.7937	1.6920	4.6316
9	1.5469	1.4898	4.2937
12	1.4525	1.3900	3.9742
15	1.3269	1.3551	3.8936
17	1.2340	1.3543	3.7827
20	1.2167	1.3238	3.7369
22	1.2064	1.2446	3.7079

17. Fu= 30° dan Fk= 0°

V (m/s)	-10	0	15
6	1.5319	1.7477	4.6898
9	1.3290	1.4643	4.4767
12	1.1900	1.3541	4.2454
15	1.1309	1.2734	4.1783
17	1.0917	1.2521	4.0428
20	1.0271	1.2414	3.9784
22	1.0094	1.2320	3.9323

18. Fu= 30° dan Fk= 15°

V (m/s)	-10	0	15
6	1.4970	1.8263	5.6112
9	1.2270	1.6675	5.2474
12	1.0881	1.5457	4.7485
15	1.0574	1.4853	4.7173
17	1.0397	1.4576	4.6696
20	1.0074	1.3958	4.6406
22	0.9514	1.3769	4.5737

19. Fu= 30° dan Fk= 30°

V (m/s)	-10	0	15
6	1.6510	2.3406	6.3297
9	1.4345	2.0778	6.0016
12	1.2420	1.8984	5.8419
15	1.2132	1.8565	5.6417
17	1.1699	1.8379	5.4346
20	1.1284	1.8219	5.3234
22	1.1098	1.7780	5.2767

20. Fu= 30° dan Fk= 45°

V (m/s)	-10	0	15
6	2.0383	2.7904	7.5540
9	1.7482	2.6019	6.8142
12	1.6073	2.5037	6.2822
15	1.4843	2.4166	6.2577
17	1.4498	2.3491	6.1727
20	1.4157	2.2243	6.0109
22	1.3724	2.2146	5.9188

21. Fu= 45° dan Fk= -10°

V (m/s)	-10	0	15
6	2.3866	2.6332	5.7159
9	2.0971	2.3421	5.2841
12	1.9608	2.2179	5.2661
15	1.8051	2.1293	5.0837
17	1.7520	2.0981	4.9730
20	1.7378	2.0369	4.9176
22	1.7310	2.0038	4.7190

22. Fu= 45° dan Fk= 0°

V (m/s)	-10	0	15
6	2.1594	2.4191	5.9726
9	1.8178	2.2576	5.7063
12	1.6714	2.0965	5.4065
15	1.6341	1.9741	5.3106
17	1.5550	1.9662	5.2079
20	1.5176	2.0447	5.0514
22	1.4455	2.0071	4.7981

23. Fu= 45° dan Fk= 15°

V (m/s)	-10	0	15
6	2.0017	2.7082	6.8003
9	1.6523	2.2960	6.2902
12	1.5843	2.2641	5.7430
15	1.5173	2.2063	5.7052
17	1.4808	2.1184	5.6015
20	1.4440	2.0376	5.5367
	1.3482	2.0152	5.4382

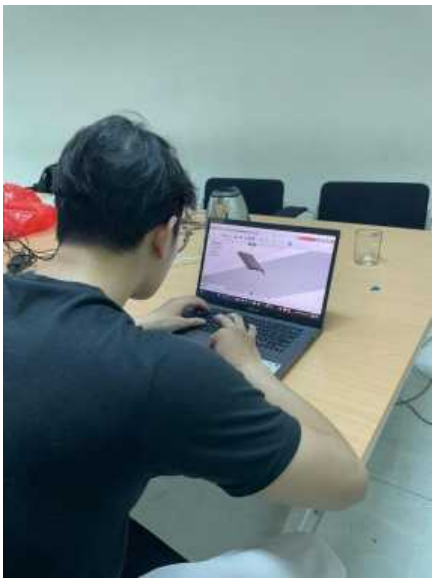
24. Fu= 45° dan Fk= 30°

V (m/s)	-10	0	15
6	2.1852	3.0630	7.9930
9	1.8955	2.8524	7.1129
12	1.7769	2.7014	6.6340
15	1.6874	2.6310	6.5572
17	1.6597	2.4755	6.3896
20	1.5577	2.4386	6.3861
22	1.5144	2.397159	6.3250

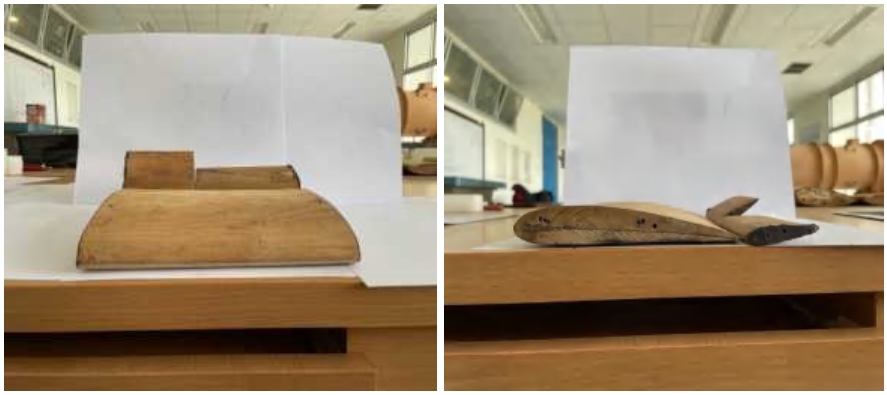
25. Fu= 45˚ dan Fk= 45˚

V (m/s)	-10	0	15
6	2.6211	3.6109	7.9590
9	2.2074	3.3579	7.7654
12	2.0044	3.2615	7.7044
15	1.9931	3.1282	7.6331
17	1.9770	2.9985	7.5714
20	1.8866	2.9576	7.3124
22	1.8143	2.9317	7.2074

Lampiran 6 Dokumentasi

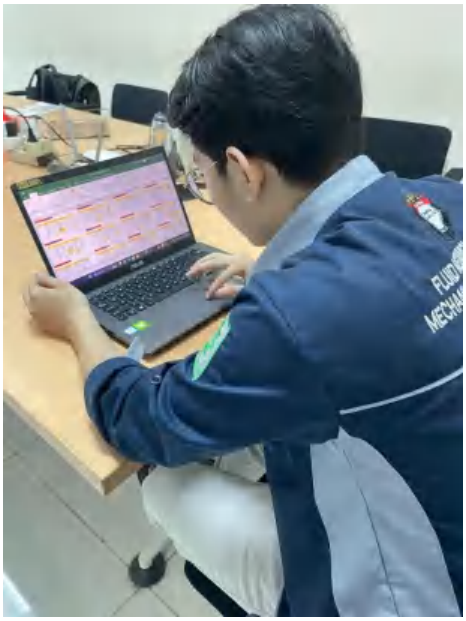


Proses pendesainan dan pengolahan data secara komputasi



Benda uji untuk percobaan eksperimental

Proses pengambailan data secara eksperimental



Proses pengolahan data