

Gliding Induction Course Patter

Key

'I have control Sir' - Text highlighted in Yellow, this highlights what the student should say without prompting.

GIC 1- 20 Minutes

Ok Bloggs while we are climbing out we are going to go through the Hand over and takeover procedure. We use the hand over and take over procedure so we know who's in control of the aircraft at any one time.

When I want you to take control I will say 'You have control', you will then place your hands and feet on the controls and say 'I have control Sir', when I want to retake control I will say 'I have control', you will then say, 'You have control, Sir' and remove your hands and feet from the controls. Any Questions?

Ok, Bloggs we are going to practice this. When I give you control what I would like you to do is to keep the control column in the central position, there will be no need to make any control inputs. Make sure you take the control column in the right hand only. Any Questions?

'You have control' 'I have control Sir' Pause 'I have control' 'You have control Sir' 'Good'

Ok Bloggs we are now going to go through the Follow through. We use the follow through, so you can feel of the Control inputs, while I MAKE THE CONTROL INPUTS,

When I want you to follow me through on the controls, I will say 'Follow me through', you will then place your hands and feet **lightly** on the controls and say 'Following through Sir'. While following through be careful not to restrict my control inputs. When I want you to relax I will say 'Relax', you will then say 'Relaxed Sir' and move your hands and feet from the controls. Any Questions?

Ok Bloggs, we are going to practice this 'Follow me through' 'Following through Sir' Pause, 'Relax' 'Relaxed Sir'

Ok Bloggs, what do understand about Attitude in relation to flying?

Ok Bloggs, Look straight Ahead out of the front of the Aircraft.

At the moment we are flying along in the **Datum Attitude**, we know we are in the Datum attitude because we can see the whole horizon parallel with the red engine cowling and the horizon is approximately one third of the way up the canopy. Any Questions?

Ok Bloggs, What do you understand by the term Pitch?

Which control surface makes the aircraft Pitch?

Where is the Elevator, Bloggs?

Ok Bloggs Look Ahead, I am now going to demonstrate PITCH.

I am now going to demonstrate the nose pitching down, notice that the picture has changed?

I am now going to demonstrate the nose pitching up; do you notice that the picture has changed?

Ok I am going to teach PITCH,

At the moment we are flying along and in the Datum attitude, we know we are in the Datum Attitude because we can see the horizon parallel with the red engine cowling and the horizon is approximately one third up the canopy.

'Follow me through on the Control Column, ONLY' 'Following through, Sir'

When I move the control column centrally forwards, the nose pitches down and continues to pitch down, until I select a neutral position. We know the nose is pitching down because we can see more ground than sky and the speed is increasing.

When I move the control column centrally rearwards, the nose pitches up and continues to pitch up until I select a neutral position. We know the nose is pitching up because we can see more sky than ground and look, the speed is reducing.

To return to the Datum Attitude, I move the control column centrally forwards, until the nose returns to its original attitude and now we are back into the Datum Attitude. 'Relax Bloggs' 'Relaxed Sir' Any Questions?

Ok Bloggs, when I give you control what I would like you to do is to pitch the nose down, and then return to the Datum Attitude, Any Questions? (Then Pitch up and return to the datum attitude)

'You have control on the Control Column ONLY' 'I have control Sir' 'I have control' 'You have control Sir' 'Good'

GIC 2 – 25 Minutes

Hand Over Take Over Procedure

Revision of Pitch as in GIC 1

Ok Bloggs, What do understand by the term Roll?
Which control surface makes us Roll?
Where are the Ailerons?

Ok Bloggs Look Ahead out of the front of the aircraft.

I am now going to demonstrate the aircraft rolling to the left, notice that the picture has changed?

I am now going to demonstrate the aircraft rolling to the Right, notice that the picture has changed?

Ok I am going to teach Roll,

'Follow me through on the Control Column, ONLY' 'Following through, Sir'

At the moment we are flying along in the Datum attitude, we know we are in the Datum Attitude because we can see the horizon parallel with the red engine cowling and the horizon is approximately one third of the way up the canopy and the aircraft is flying along at 60 knots.

When I move the control column to the left the aircraft rolls to the left, the aircraft continues to roll to the left until I select a neutral position on the control column and now the aircraft is in a banked attitude to the left, notice Bloggs, that I have only moved the control column about one centimetre to the left in order to roll to the left.

When I move the control column to the Right the aircraft rolls to the Right, the aircraft continues to roll to the Right until I select a neutral position on the control column and now the aircraft is in a banked attitude to the Right, notice Bloggs, that I have only moved the control column about Two centimetres to the Right to get sufficient roll to the Right.

To return to the Datum Attitude, I move the control column to the left until the wings become level, and I can see the horizon parallel with the red engine cowling and the horizon is one third up the canopy and the aircraft is flying at 60 knots. 'Relax' 'Relaxed Sir' Any Questions?

Ok Bloggs, when I give you control what I would like you to do is to roll the aircraft to the left, and then return it to the Datum Attitude, Any Questions?

(Repeat to the Right)

'You have control on the Control Column ONLY' 'I have control Sir' 'I have control' 'You have control Sir' 'Good'

Bloggs, Is this the Datum Attitude, 'No, Sir'

Ok, I am now going to demonstrate how to return the aircraft to the Datum Attitude.

Ok Bloggs, I am now going to teach you how to return the aircraft to the Datum attitude, from a displaced attitude. 'Follow me through on the Control Column, ONLY' 'Following through, Sir' Is this the Datum Attitude 'No, Sir'

Ok, to return the Aircraft to the Datum Attitude, firstly roll the wings level, and pitch the nose to return to the datum attitude, by moving the control column centrally backwards. The aircraft is back to the Datum Attitude. 'Relax' 'Relaxed Sir' Any Questions?

Ok bloggs, when I give you control, the aircraft will not be in the Datum Attitude and what I would like you to do is to return the aircraft to the Datum Attitude. Any Questions?

'You have control on the Control Column ONLY' 'I have control Sir' 'I have control' 'You have control Sir' 'Good'

Repeat for a high nose attitude and different banked attitude.

GIC 3 – 30 Minutes

Hand Over Take Over Procedure

Revision of Pitch as in GIC 1

Revision of Roll as in GIC 2

Ok Bloggs, What do understand by the term Yaw?
Which control surface makes us Yaw?
Where is the Rudder?

Ok, I am now going to introduce a new instrument, this instrument is called the 'Turn and Slip Indicator', but you just need to look at the slip ball. When the ball is between the two goal posts the aircraft is flying in balance, if the ball goes out to the left or right of the two goal posts the aircraft is flying out of balance therefore need to use rudder to keep the aircraft in balance.

Ok Bloggs Look Ahead, I am now going to demonstrate Yaw.
I am now going to demonstrate the aircraft Yawing to the left, notice that the picture has changed?
I am now going to demonstrate the aircraft Yawing to the Right, notice that the picture has changed?

Ok I am going to teach Yaw,

'Follow me through on the Rudder Pedals, ONLY' 'Following through, Sir'

At the moment we are flying along in the Datum attitude and the aircraft is in Balance flight.

When I apply pressure on the left rudder pedal, the aircraft Yaws to the left, and continues to yaw to the left until I apply a constant pressure on the left rudder pedal, notice that the ball has gone out to the right, therefore the aircraft is flying out of balance.

To return the aircraft to balanced flight, I apply slight pressure on the right rudder pedal until the aircraft comes back into balanced flight with the ball in the middle. The aircraft is back in balanced flight, with the ball in the middle.

When I apply pressure to the Right rudder pedal, the aircraft Yaws to the Right, and continues to yaw to the Right until I apply a constant pressure on the Right rudder

pedal. Notice that the ball has gone out to the left, therefore the aircraft is flying out of balance.

To return the aircraft to balanced flight, I release the pressure on the right rudder and apply slight pressure on the left rudder pedal until the aircraft returns to balanced flight with the ball in the middle. The aircraft is back in balanced flight, with the ball in the middle.

'Relax' **Relaxed Sir**, Any Questions?

Ok, Bloggs when I give you control I would like you to Yaw the aircraft to the Left, then return the aircraft back to balanced flight, with ball in the middle. Any Questions?

'You have control on the Rudder Pedals ONLY' **I have control Sir** 'I have control'
'**You have control Sir**' 'Good'

Repeat the yawing to the Right (Done separately to reduce the risk of undemanded pitch down, when yawing straight from the left to the right or sharply right.)

Instructor to Demonstrate the Full Stall.

What do you understand about the term Stalling?

Advice: - Do the Full Stall demonstration from the Glide

Things to point out are...

Signs-

Nose high attitude
Noise Decreasing
Speed decreasing
Controls becoming less effective

Symptoms-

Buffet
Nose pitches down despite control column held fully back
Loss of Height
Possible Wing Drop

-Point out Stall
-Point out height loss and Speed