

Vision AS range pan and tilt heads

Operators Guide V4045-4980



Vision AS range Pan and Tilt Heads

Original Instructions Issue 1

Copyright © Vitec Group plc 2009

All rights reserved throughout the world. No part of this document may be stored in a retrieval system, transmitted, copied or reproduced in any way including, but not limited to, photocopy, photograph, magnetic or other record without the prior agreement and permission in writing of Vitec Group plc.

Trademarks

Vinten® and Vision® are registered trademarks of Vitec Group plc.

Important information about this document

Information contained within this document is subject to change. Camera Dynamics Limited reserves the right, without notice to make changes in equipment design or performance as progress in engineering, manufacturing or technology may warrant.

Published by

Camera Dynamics Ltd Technical Publications Department William Vinten Building Western Way Bury St Edmunds Suffolk IP33 3TB

Email: technical.publications@vitecgroup.com



Safety - read this first

Warning Symbols in this Operators Guide



Where there is a risk of personal injury or injury to others, comments appear highlighted by the word WARNING!—supported by the warning triangle symbol.

Where there is a risk of damage to the product, associated equipment, process or surroundings, comments appear highlighted by the word CAUTION!

Usage

The Vision AS range of pan and tilt heads are designed for use by professional camera operators and are ideally suited for electronic news gathering and video production. These lightweight heads can support and balance a camera and ancillary equipment weighing up to 14.5 kg (32 lb). It is important that the head is mounted onto equipment designed to support the head and its maximum payload.



WARNING!

- Do NOT attempt to use this product if you do not understand how to operate it.
- 2. Do NOT use this product for any other purpose than that specified in this Usage statement.
- 3. Maintenance beyond that detailed in this Operators Guide must be performed only by competent personnel in accordance with the procedures specified in the Maintenance Manual.

Caring for the environment by recycling

Disposal of waste batteries

Any batteries included with this product must not be treated as household waste. By ensuring these batteries are disposed of correctly, you will help prevent potentially negative consequences for the environment and human health, and help conserve natural resources. Please view the section on how to remove the battery from the product safely. Hand the battery over to the applicable collection point for recycling waste batteries.



Technical specification

Vision 3 AS pan and tilt head	
Height	15.1 cm (5.9 in.)
Length	13.8 cm (5.4 in.)
Width	13.8 cm (5.4 in.)
Weight including pan bar and bowl clamp assembly	2.8 kg (6.2 lb)
Tilt range	±90°
Pan range	360°
Levelling bubble	illuminated
Typical Payload @ 125 mm CofG	2.0 kg (4.4 lb) - 5.0 kg (11.0 lb)
Mounting interface	75 mm ball base
Pan bar	single universal fixed length
Visian E AC non and tilt hand	
Vision 5 AS pan and tilt head Height	15.1 cm (5.0 in)
	,
Length Width	, ,
Weight including pan bar and bowl clamp assembly	
Tilt range	
Pan range	
Levelling bubble	
Typical Payload @ 125 mm CofG	
Mounting interface	
Pan bar	
Tan bar	
Vision 8 AS pan and tilt head	
Height	
Length	
Width	
Weight including pan bar and bowl clamp assembly	3.1 kg (6.8 lb)
Tilt range	±90°
Pan range	
Levelling bubble	illuminated
Typical payload @ 125 mm CofG	5.5 kg (12.1 lb) - 12.5 kg (27.6 lb)
Mounting interface	100 mm ball base
Pan bar	single universal fixed length





Contents

	Page
Safety - read this first	3
Usage	3
Caring for the environment by recycling	3
Technical specification	
Introduction and description	
Balance	9
Pan and tilt drag	9
Pan and tilt brakes	9
Illuminated level bubble	9
Camera mounting	9
Pan bar	10
Operation	
Fitting the pan bar	11
Mounting the camera using 3/8 in. camera mounting screws	12
Checking camera balance	16
Applying the pan and tilt brakes	
Applying pan and tilt drag	
Maintenance	
General	22
Cleaning	22
Routine maintenance	22
Battery replacement	22
Adjusting the pan and tilt brakes	
Parts list	
Warranty Details and Terms and Conditions	



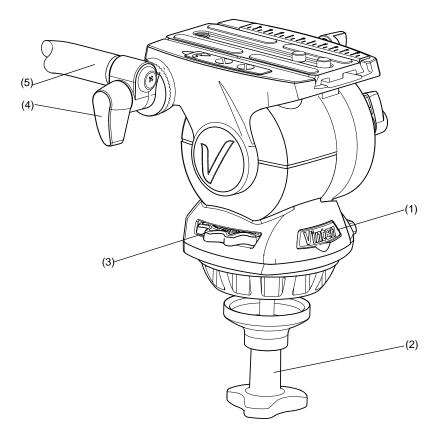


Fig. 1 Vision AS pan and tilt head (front and right-hand side)

(1)	Battery compartment
(2)	Bowl clamp assembly
(3)	Perfect balance control
(4)	Pan bar clamp
(5)	Pan bar



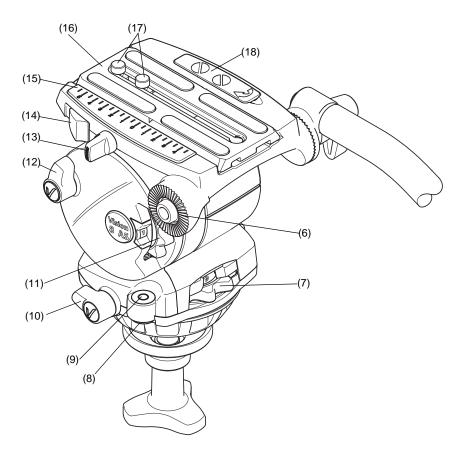


Fig. 2 Vision AS pan and tilt head (left-hand side)

(6)	Pan bar mounting
(7)	Pan drag control
(8)	Switch for illuminating the level bubble
(9)	Level bubble
(10)	Pan brake lever
(11)	Tilt drag control
(12)	Tilt brake lever
(13)	Slide plate clamp
(14)	Slide load release
(15)	Slide plate scale
(16)	Slide plate (side-loading)
(17)	3/8 in. camera mounting screws
(18)	Camera screw storage compartment



Introduction and description

The Vision 3AS, 5AS, 8AS and 10AS pan and tilt heads have been designed to support and perfectly balance a range of professional digital video cameras weighing up to 14.5 kg (32 lb). The Vision AS pan and tilt head is equipped with a quick release side-loading camera plate that allows operators to easily and quickly setup and remove the camera. Levelling the head is achieved using the level bubble that can be illuminated when setting up at locations with low lighting levels. The placement of the pan and tilt brakes, drag controls and counter balance allows the operator to easily adjust the settings whilst operating the camera.

Balance

The AS head provides infinitely adjustable balance, allowing operators to adjust the amount of counter balance required using the Perfect Balance control (3) located on the right-hand-side of the head. Maximum and minimum payloads that can be balanced are dependent on the weight of the camera and accessories fitted, and on the centre of gravity (C of G) height. The balance graphs (Fig. 8, Fig. 9, Fig. 10 and Fig. 11) illustrate the range of load and C of G height that can be maintained in balance.

Pan and tilt drag

Both pan and tilt mechanisms incorporate the patented Vinten lubricated friction (LF) system to ensure smooth movement of the camera about these axes. The pan and tilt drag is adjusted using the pan drag control (7) and tilt drag control (11).

Pan and tilt brakes

Both pan and tilt brakes allow each axis on the head to be locked at any chosen position. The pan brake lever (10) and tilt brake lever (12) are located on the left-hand side of the head.

Illuminated level bubble

An illuminated level bubble (9) is located to the rear of the head on the left-hand side. In situations of low light, the level bubble can be illuminated by pressing the switch (8) located underneath the level bubble. The level bubble will be illuminated for approximately 20 seconds. The battery for the illuminated level bubble is fitted in the battery compartment located at the front of the head (1) behind the Vinten label.

Camera mounting

The camera is attached to the head using the new side-loading slide plate (16), which allows the camera to be rapidly setup and removed. The side-loading slide plate (16) is attached to the camera and then loaded from above into a side-loading clamp mechanism and secured in position by the slide plate clamp (13). The slide load release (14) allows rapid removal of the slide plate (16) from the head by lifting the camera upwards.

The head is supplied with a 1/4 in. screw and pin adaptor to suit most lightweight camcorders and two 3/8 in. camera mounting screws. When not in use, the 1/4 in. screw and pin adaptor, and 3/8



in. camera mounting screws can be stored in the camera screw storage compartment (18) located on the left-hand side of the camera mounting platform.

Pan bar

Pan bar mounting points (6) are located at the rear of the head on either side of the camera mounting platform. The pan bar (5) is attached using a pan bar clamp (4), with angular adjustment available on the mount serrations. A fixed pan bar is supplied with the Vision 3AS, 5AS and 8AS heads. A telescopic pan bar is supplied with the Vision 10AS head. A second pan bar may be fitted on the other side of the head if required.

Field service spares kit

A field service spares kit (V4045-1902), that includes brake levers and a spare battery, is supplied with all Vision AS pan and tilt heads. See the Field service spares kit on page 27 for more information.



Operation

Fitting the pan bar

A single pan bar is supplied and is fitted to either the right or left-hand side of the head onto the pan bar mounting (6).

To fit the pan bar:

Position the pan bar (5) onto the pan bar mounting (6).

Rotate the pan bar clamp (4) in a clockwise direction until the pan bar is secured.

A second pan bar can be fitted to the other side of the head if required.

Installing the head onto a tripod

The Vision 3AS and 5AS pan and tilt heads are supplied with an integral 75mm ball mount and the Vision 8As and 10AS heads have an integral 100 mm ball mount, designed for installation on a compatible Vinten tripod. Adaptors are available to allow the head to be installed onto tripods or pedestals fitted with other mountings.

To install the head onto the tripod:

Remove the bowl clamp assembly (2) from the head by turning the assembly in a counterclockwise direction.

Position the head on the tripod, carefully lowering the head into the tripod bowl.

Using the pan bar to steady the head, refit the bowl clamp assembly (2) from below the tripod bowl, turning the bowl clamp assembly (2) in an clockwise direction until the head is held in position.

Apply the pan brake (10) and tilt brake (12) by turning the levers in a clockwise direction.

CAUTION! DO NOT use force on the brake levers. Hand tighten only.

Level the head using the level bubble (8) and once level, tighten the bowl clamp assembly (2) to secure the head in position. When attempting to level the head in situations where there is low light, the level bubble can be illuminated by pressing the switch (8) located underneath the level bubble (9). The light will extinguish after approximately 20 seconds.



Mounting the camera using 3/8 in. camera mounting screws

The camera slide plate (16) is secured to the base of the camera using either two 3/8 in. camera screws or a 1/4 in. screw pin adaptor (see Mounting the camera using the 1/4 in. screw and pin adaptor on page 14).

To mount the camera onto the head:

Remove the camera slide plate (16) from the head (Fig. 3). Turn the slide plate clamp (13) approximately 1/2 a turn in a counter-clockwise direction to release the clamp. Then push the slide lock release (14) in a forwards direction to release and eject the slide plate (16). When released, the camera slide plate (16) can be lifted upwards and removed from the head.

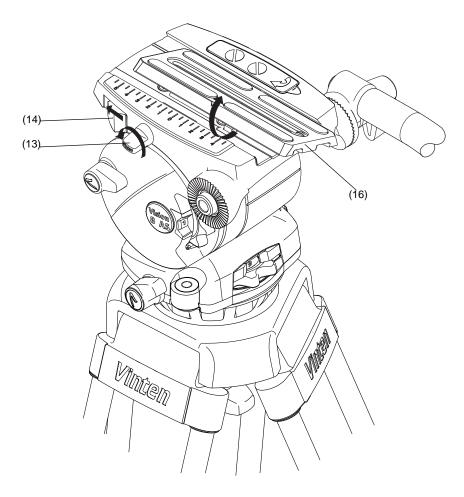


Fig. 3 Removing the camera slide plate



Position the two 3/8 in. camera screws (17) as far apart as possible on the camera slide plate (16) (Fig. 4).

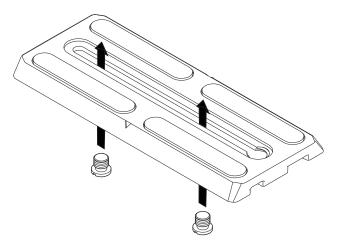


Fig. 4 Fitting the 3/8 in. camera mounting screws

Attach the camera slide plate (16) to the camera or camera mounting plate approximately under the centre of the camera's weight.

If not already done, apply both the pan brake (10) and tilt brake (12) by turning the levers in a clockwise direction.

CAUTION! DO NOT use force on the brake levers. Hand tighten only.

Lower the camera onto the camera mounting platform (Fig. 5) ensuring that the edge of the camera slide plate (16) opposite the slide clamp (13) engages first, and then push downward until the slide clamp 'snaps' into position.

Using the pan bar (5) to steady the camera, tighten the slide plate clamp (13) in a clockwise direction to secure the camera in position.



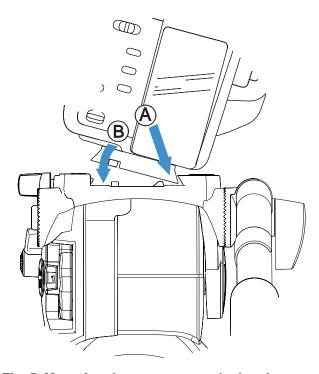


Fig. 5 Mounting the camera onto the head

Mounting the camera using the 1/4 in. screw and pin adaptor

A 1/4 in. screw and pin adaptor, comprising a 1/4 in. locating pin on a plate and a 1/4 in. camera mounting screw, is stored in the camera storage compartment (18) on right-hand side of the camera mounting platform. The process of mounting the camera onto the head is the same as described in Mounting the camera using 3/8 in. camera mounting screws on page 12.

To mount the camera onto the head:

Remove the camera slide plate (16) from the head (Fig. 3). Turn the slide plate clamp (13) approximately 1/2 a turn in a counter-clockwise direction to release the clamp. Then push the slide lock release (14) in a forwards direction to release and eject the slide plate (16). When released, the camera slide plate (16) can be lifted upwards and removed from the head.

Open the camera storage compartment (18) by lifting the cover upwards and remove the 1/4 in. screw and pin adaptor (19) (Fig. 6).



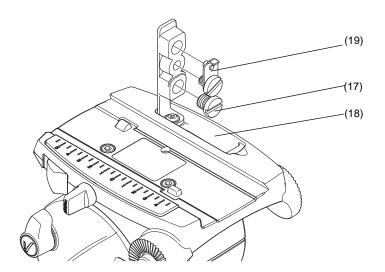


Fig. 6 Camera screw storage compartment

Remove the 3/8 in. camera mounting screws (17) from the camera slide plate (16) (if not already done) and place them into the camera storage compartment (18). Secure the compartment cover by pressing the cover downwards.

Mount the 1/4 in. screw and pin adaptor (19) onto the top of the camera slide plate (16) with the 1/4 in. camera mounting screw from under the slide plate (Fig. 7).

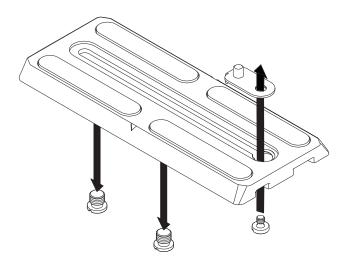


Fig. 7 Fitting the 1/4 in. pin adaptor assembly

Attach the camera slide plate (16) to the camera or camera mounting plate approximately under the centre of the camera's weight.



If not already done, apply both pan brake (10) and tilt brake (12) by turning the levers in a clockwise direction.

CAUTION! DO NOT use force on the brake levers. Hand tighten only.

Lower the camera onto the camera mounting platform (Fig. 5) ensuring that the edge of the camera slide plate (16) opposite the slide clamp (13) engages first, and then push downward until the slide clamp 'snaps' into position.

Using the pan bar (5) to steady the camera, tighten the slide plate clamp (13) in a clockwise direction to secure the camera in position.

Checking camera balance

A perfectly balanced head allows operators to control camera movement with the minimal amount of effort. Once balanced, the head and its payload can be set to any tilt position and remain at that position, allowing operators work hands-free.

Balance graphs (Fig. 8, Fig. 9, Fig. 10 and Fig. 11) illustrate the relationship between load and Centre of Gravity (C of G) height for each Vision AS pan and tilt head. The balance graphs can be used to ascertain the suitability of the head for any given combination of camera, lens and accessories. The shaded area of graph corresponds to those load/C of G combinations that can be balanced over the full tilt range. The areas to the right indicate the progressively reducing tilt range with greater load and higher C of G. Where a load/C of G combination falls outside of the graph it will be necessary to increase or decrease the weight or the C of G height to enable the head to balance the load.

Before balancing the head, ensure that the camera and lens, pan bar(s) and all ancillary equipment has been fitted. The head must be balanced whenever the camera and/or lens is changed, or when ancillary equipment is added or removed.



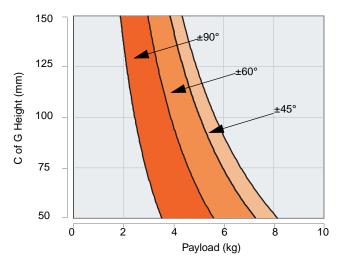


Fig. 8 Vision 3AS balance graph

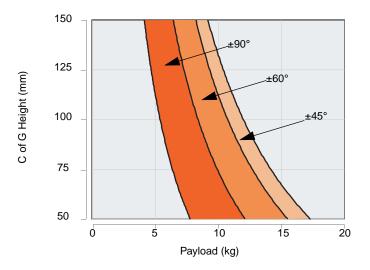


Fig. 9 Vision 5AS balance graph



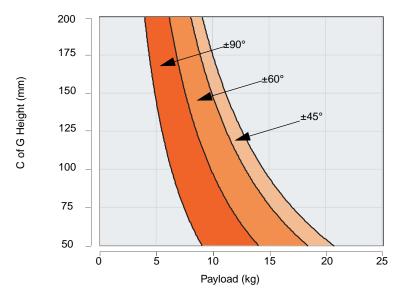


Fig. 10 Vision 8AS balance graph

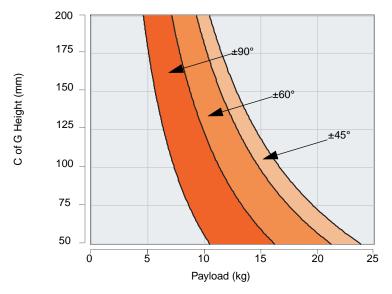


Fig. 11 Vision 10AS balance graph





WARNING!

- 1. 1. Do NOT exceed the maximum capacity of either the head or the tripod. The system will become unstable and may fail.
- 2. Always support the camera payload when disengaging the counter-balance (Perfect Balance control) mechanism to prevent it falling away suddenly.
- 3. Keep hands clear of the moving platform to avoid trapping fingers.

To check camera balance:

Reduce tilt drag to a minimum level by turning the tilt adjustment control (11) in an counterclockwise direction.

Reduce the counter-balance a minimum level by turning the perfect balance control (3) in a clockwise direction.



WARNING!

Steady the camera payload using the pan bar. Be prepared to prevent the head falling away suddenly.

Release the tilt brake (12) by turning the lever in a counter-clockwise direction.

Turn the perfect balance control (3) counter-clockwise until the head falls away from the horizontal under the weight of the camera and payload.

Tilt the head backwards and forwards to determine if the camera position is equally balanced in both directions. The camera and payload must be positioned over the centre of gravity.



Fig. 12 Positioning the camera over the Centre of Gravity

If the camera is not positioned over the centre of gravity, set the platform level and apply the tilt brake (12). Position the camera correctly on the head by releasing the slide plate clamp (13) and then sliding the camera (on the camera slide plate) backwards or forwards



until it balances horizontally. Tighten the slide plate clamp (13) to secure the camera in position. Re-check and adjust as necessary.



WARNING!

Securely apply the slide plate clamp (13) when the camera is positioned, to prevent the camera payload slipping.

Using the pan bar (5), tilt the head backwards and forwards. Turn the Perfect Balance control (3) clockwise until the camera remains in position and does not fall away when the head is tilted and then released (hands-free).

Repeat the setup until perfect balance is achieved, when the camera remains set at any angle from +90° to -90° without falling away or springing back.

NOTE: Maximum tilt angle is less than 90° for heavy payloads with a high C of G refer to the balance graphs (Fig. 8 to Fig. 11).

Apply the tilt brake (12) when balance is achieved to prevent the camera from moving accidentally when not in use.

Applying the pan and tilt brakes

Brakes on each axis allow the head to be locked at any chosen position. The pan brake (10) and tilt brake (12) are fitted at the left-hand side of the head.

CAUTION! DO NOT use the brakes to supplement drag, the head may be damaged. When the brakes are not in use, always ensure they are fully released.

To apply the brake:

Turn the brake lever fully clockwise.

CAUTION! DO NOT use force on the brake levers. Hand tighten only.

To release the brake:

Turn the brake lever fully counter-clockwise



Applying pan and tilt drag

Both the pan and tilt mechanisms incorporate a fluid drag system to ensure smooth movement of the camera about these axes. The tilt drag control (11) is located on the left-hand side of the head and the pan drag control (7) is located at the back of the head, beneath the camera mounting platform.

NOTE: The whip-pan facility is not affected by the pan drag setting.

CAUTION! Reduce drag to a minimum when the head is out of use for long periods, to minimize wear on drag components.

To increase tilt drag:

Turn the tilt drag control (11) in a clockwise direction (downward).

To decrease tilt drag:

Turn the tilt drag control (11) in a counter-clockwise direction (upward).

To increase pan drag:

Turn the pan drag control (7) in a counter-clockwise direction (left to right).

To decrease pan drag:

Turn the pan drag control (7) in a clockwise direction (right to left).

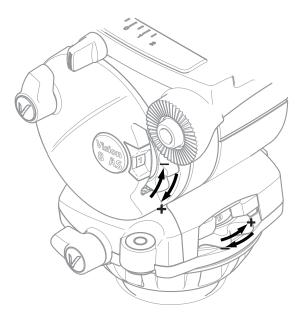


Fig. 13 Adjusting the pan and tilt drag



Maintenance

General

Vinten products are robustly made to high engineering standards and little attention is required to maintain serviceability save regular cleaning. Attention to the following points will ensure a long and useful service life with minimum need for repair.

Cleaning

During indoor use, the only cleaning required should be a regular wipe over with a lint-free cloth. Dirt accumulated during storage may be removed using a semi-stiff brush. Particular attention should be paid to the ball mounting face of the head, the space between the tilting assembly and the base and the mounting bowl of the tripod.

Use out-of-doors under adverse conditions will require special attention. Salt spray should be washed off with fresh water at the earliest opportunity. Sand and dirt acts as an abrasive and should be removed using a semi-stiff brush or vacuum cleaner.

CAUTION! DO NOT use solvent or oil-based cleaners, abrasives or wire brushes to remove accumulations of dirt, as these damage the protective surfaces. Use only detergent-based cleaners.

Routine maintenance

During use, check the following:

Check the illumination of the level bubble. Replace battery if necessary.

Check the effectiveness of the pan and tilt drag controls. Reset as necessary.

Check the effectiveness of the pan and tilt brakes. Reset as necessary.

No further routine maintenance is required.

Battery replacement

The battery used to illuminate the level bubble should be replaced yearly or whenever the illumination is considered inadequate. A replacement battery is included in the field service spares kit.

To replace the battery:

Using a thin-bladed precision screwdriver or similar tool, carefully prise open the battery compartment (1).

Pull out the battery compartment (1) from the head.

Remove the battery (1.1).



Position the new battery (positive terminal upward) in the battery compartment (1), ensuring that it is neatly stowed in the cut-out provided.

CAUTION! Use plastic tweezers when handling the battery. Avoid shortening the battery by holding it by the circumference edge.

Refit the battery compartment (1) into the head.

CAUTION! DO NOT use force on the battery compartment. Ensure that the compartment is correctly aligned with the fittings inside the head.

Press the switch (8) and ensure that the level bubble (9) illuminates for approximately 20 seconds.

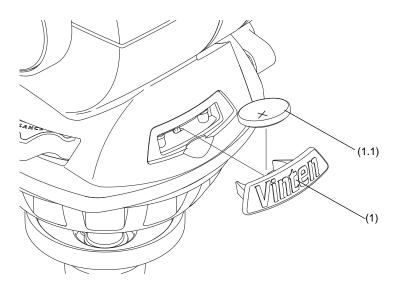


Fig. 14 Replacing the level bubble battery



Adjusting the pan and tilt brakes

The pan and tilt brakes may require adjustment after prolonged use. These adjustments should be carried out by competent persons only. The field service spares kit includes replacement brake levers and caps (if required).

To adjust the brakes:

Turn the brake lever counter-clockwise to its lowest off position as shown in Fig. 15.

Insert the thin-blade of a precision screwdriver or similar tool into the top of the cap (10.1) & (12.1). Carefully prise off the cap. Note that the cap is secured using a small adhesive pad and therefore may require a small amount of force to remove.

Using a 2.5mm allen key, remove the screw (10.2) & (12.2) securing the brake lever.

Remove the brake lever without moving the brake shaft.

Turn the brake shaft clockwise until the brake makes contact (approximately 30-45 degrees from the off position).

Replace the brake lever onto the brake shaft at approximately 30-45 degrees from the off position (Fig. 15).

Refit the screw (10.2) & (12.2) using the allen key.

Turn the lever clockwise and ensure that the brake is fully applied before the end stop is reached.

Turn the lever fully counter-clockwise and ensure that the brake is fully released before the end stop is reached.

Re-adjust the position of the lever as necessary.

Ensure that the brake is set to the off position and replace the cap (10.1) & (12.1). Ensure that the cap is positioned with the cut-out at the top and the 'V' in a vertical position.



(12.1) (12.2) (10.1) (10.2) (10.1)

Fig. 15 Adjusting the pan and tilt brakes



Parts list

The following parts lists include main assemblies, user-replaceable spare parts and field service spares kit. The Vision range can be purchased as a complete system including tripod, spreader and soft case if required. For further information regarding the complete systems and spare parts, please contact Camera Dynamics Ltd or your local Vinten distributor.

For information on-line, visit our website at

www.vinten.com

Vision AS range of pan and tilt heads
Vision 3AS (75mm bowl)
Vision 5AS (75mm bowl)
Vision 8 AS (100mm bowl)
Vision 10 AS (100mm bowl)
Pan bars
Telescopic pan bar (Vision 10AS)3219-91
Fixed pan bar (Vision 3AS & Vision 5AS)3219-110
Fixed pan bar (Vision 8AS)
Tripods
Single stage aluminium Pozi Loc tripod, 100mm bowl, black, ENG
Single stage aluminium Pozi Loc tripod, 75mm bowl, black, ENG
Single stage carbon fibre Pozi-Loc tripod, 100mm bowl, black, ENG3773-3
Single stage carbon fibre Pozi-Loc tripod, 75mm bowl, black, ENG3777-3
Two stage aluminium Pozi Loc tripod, 100mm bowl, black, ENG
Two stage aluminium Pozi Loc tripod, 75mm bowl, black, ENG
Two stage carbon fibre Pozi-Loc tripod, 100mm bowl, black, ENG
Two stage carbon fibre Pozi-Loc tripod, 75mm bowl, black, ENG
Spreaders
Floor spreader
Spread-Loc mid-level spreader including carpet feet
Soft Cases
Single stage tripod case
Two stage tripod case
User-replaceable spare parts
Camera slide plate (side-loading)
3/8 in. camera screw (AS range only)
1/4 in. screw and pin adaptor
Battery tray moulding (8AS & 10AS)



Battery tray moulding (3AS & 5AS)
Bowl clamp assembly
Field service spares kit
Field service spares kit
Brake lever (2 off)
Brake lever cap (2 off)
Screw (2 off)
Battery (CR2032 3.0V/230mAh)



Warranty Details and Terms and Conditions

Please read the Warranty Details and Terms and Conditions for your product.

Register your product now on-line at www.vinten.com/register to get One Extra Year Warranty and a Free Vinten Quality Gift.

The product serial number is located on the camera mounting platform, under the camera slide plate.

Vinten warrants, to the original purchaser only, that this product will be free from defects in materials and workmanship under normal and proper usage for a period of one (1) year from the date of purchase. Vinten's obligation under this warranty is limited to replacing or repairing, at Vinten's option, products or parts determined by Vinten to be defective in materials or workmanship. This Vinten parts and labour warranty is subject to the terms and conditions set forth below.

Extended Warranty

By registering on-line, the warranty on Vinten hardware products described above is extended from one (1) to two (2) years from the date of purchase subject to the terms and conditions below.

Terms and Conditions

Notification of Warranty Claims

All warranty claims must be made in writing and must include date and proof of purchase

Extent of liability

This warranty is given to the original purchaser of the goods only and cannot be assigned, except with the prior written agreement of Vinten.

Subject to these terms and conditions, Vinten will repair or replace, free of charge, any product or defective part provided that the defective part of the product has been returned to Vinten or its authorized agent, freight pre-paid.

If any defective product has been superseded and cannot be repaired, replacement will be made with a current model of the same quality and equivalent function.

Exclusion of Liability

This warranty does not cover any damage, defects or costs caused by: (1) modification, alteration, repair or service of the product by anyone other than Vinten or its authorized representative; (2) physical abuse to, overload of, or misuse of, the product, or operation of the product in a manner contrary to the instructions accompanying the product; (3) any use of the product other than that for which it was intended; or (4) shipment of the product to Vinten for service.

UNDER NO CIRCUMSTANCES SHALL VINTEN BE LIABLE FOR ANY SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES, INCLUDING, BUT NOT LIMITED TO, PERSONAL INJURY, PROPERTY DAMAGE, DAMAGE TO OR LOSS OF EQUIPMENT, LOST PROFITS OR REVENUE, COSTS OF RENTING REPLACEMENTS AND OTHER ADDITIONAL EXPENSES, EVEN IF VINTEN HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES. SOME JURISDICTIONS DO NOT ALLOW THE EXCLUSION OR LIMITATION OF INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THE ABOVE LIMITATION OR EXCLUSION MAY NOT APPLY TO YOU.



ANY EXPRESS WARRANTY NOT PROVIDED HEREIN, AND ANY REMEDY WHICH, BUT FOR THE WARRANTY CONTAINED HEREIN, MIGHT ARISE BY IMPLICATION OR OPERATION OF LAW IS HEREBY EXCLUDED AND DISCLAIMED INCLUDING THE IMPLIED WARRANTIES OF MERCHANTABILITY AND OF FITNESS FOR A PARTICULAR PURPOSE. SOME JURISDICTIONS DO NOT ALLOW LIMITATIONS ON IMPLIED WARRANTIES, SO THE ABOVE LIMITATION MAY NOT APPLY TO YOU.

THIS WARRANTY GIVES YOU SPECIFIC LEGAL RIGHTS AND YOU MAY ALSO HAVE OTHER RIGHTS, WHICH MAY VARY FROM JURISDICTION TO JURISDICTION.



NOTES

CHINA

The Vitec Group plc China

Rm 706, Tower B

Derun Building, YongAn Dongli A No.8,

Jianwai Ave., Chaoyang District,

Beijing, China 100022

Tel: +86 10 8528 8748

Fax: +86 10 8528 8749

FRANCE

Camera Dynamics Sarl 171, Avenue des Grésillons

92635 GENNEVILLIERS Cedex

France

Tel: +33 820 821 336

Fax: +33 825 826 181

GERMANY

Camera Dynamics GmbH

Gebäude 16

Planiger Straße 34

55543 Bad Kreuznach

Germany

Tel: +49 671 / 483 43 30

Fax: +49 671 / 483 43 50

Camera Dynamics GmbH

Erfurter Straße 16

85385 Eching

Germany

Tel: +49 89 / 321 58 200

Fax: +49 89 / 321 58 227

JAPAN

Vinten Japan KK

P.A. Bldg. 5F

3-12-6 Aobadai

Meguro-ku Tokyo 153-0042

Japan

Tel: +81 3 5456 4155

Fax: +81 3 5456 4156

SINGAPORE

Camera Dynamics Pte Ltd

6 New Industrial Road

#02-02 Hoe Huat Industrial Building

Singapore 536199

Tel: +65 6297 5776

Fax: +65 6297 5778

UK

Camera Dynamics Ltd

William Vinten Building

Western Way

Bury St. Edmunds

Suffolk IP33 3TB

UK

Tel: +44 1284 752 121

Fax: +44 1284 750 560

Sales Fax: +44 1284 757 929

USA

Camera Dynamics Inc.

709 Executive Blvd

Valley Cottage

NY 10989

USA

Tel: +1 845 268 0100

Fax: +1 845 268 0113

Toll Free Sales: +1 888 2 Vinten

www.vinten.com

