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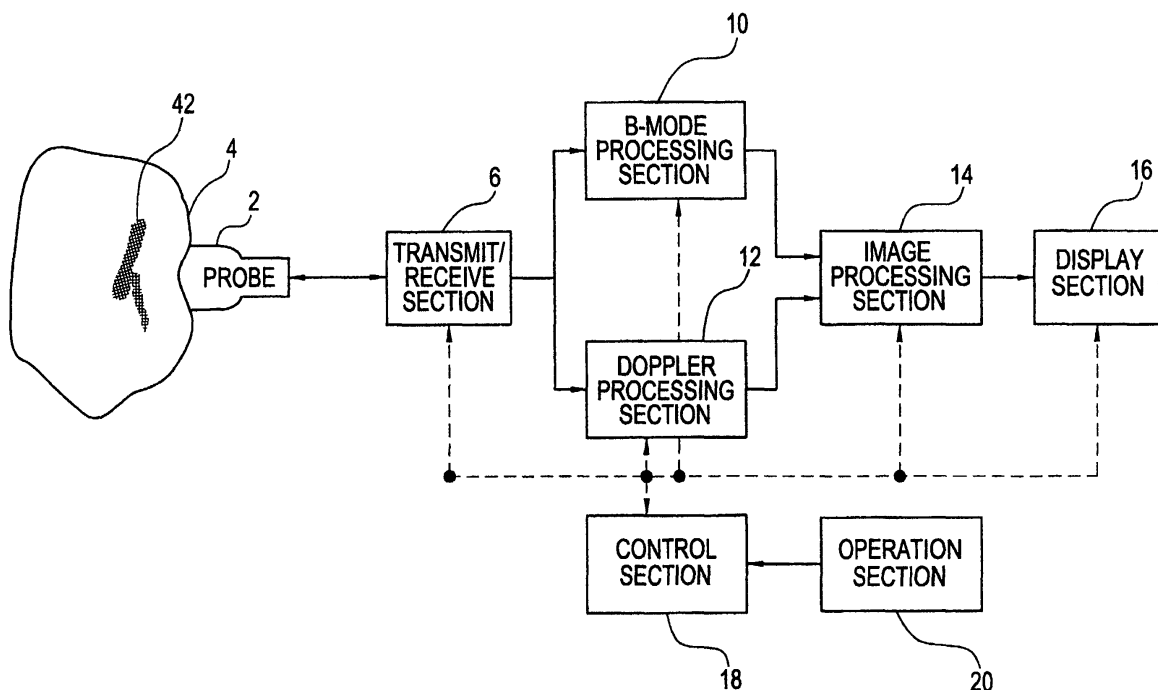
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(54) **Image forming method and apparatus, and ultrasonic imaging apparatus**

(57) In forming an image (16) without clutters indicative of a dynamic state of an echo source (4) containing a harmonic contrast agent (42) based on the Doppler

shift of an ultrasonic echo (2,6), the variance T of the velocity of the echo source is evaluated based on the Doppler shift (12), and the signal strength of the image is adjusted depending (14) on the value of variance.

**FIG. 1**





European Patent  
Office

EUROPEAN SEARCH REPORT

Application Number  
EP 01 30 2484

DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int.Cl.7)
X	US 5 928 151 A (HOSSACK JOHN A ET AL) 27 July 1999 (1999-07-27) * abstract; figure 1 * * column 10, line 63 - column 11, line 67 *	1,5-7, 11-13	G01S15/89 G01S7/52 A61B8/00
X	US 6 001 063 A (GURACAR ISMAYIL) 14 December 1999 (1999-12-14) * figure 1 * * column 1, line 7-43 * * column 2, line 65-67 * * column 3, line 23-29 * * column 4, line 14-40 *	1,5,7, 11,13	
A	US 5 891 037 A (O'DONNELL MATTHEW ET AL) 6 April 1999 (1999-04-06) * figure 6 * * column 5, line 18 - column 6, line 41 * * column 8, line 7-10 *	1-13	
			TECHNICAL FIELDS SEARCHED (Int.Cl.7)
			G01S A61B
The present search report has been drawn up for all claims			
Place of search		Date of completion of the search	Examiner
MUNICH		3 May 2004	Reuss, T
CATEGORY OF CITED DOCUMENTS		T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons ..... & : member of the same patent family, corresponding document	
X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document			

EPO FORM 1503 03.82 (P04C01)

**ANNEX TO THE EUROPEAN SEARCH REPORT  
ON EUROPEAN PATENT APPLICATION NO.**

EP 01 30 2484

This annex lists the patent family members relating to the patent documents cited in the above-mentioned European search report. The members are as contained in the European Patent Office EDP file on  
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03-05-2004

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US 6001063 A	14-12-1999	NONE	
US 5891037 A	06-04-1999	NONE	

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For more details about this annex : see Official Journal of the European Patent Office, No. 12/82

专利名称(译)	图像形成方法和设备，以及超声成像设备		
公开(公告)号	<a href="#">EP1136841A3</a>	公开(公告)日	2004-06-23
申请号	EP2001302484	申请日	2001-03-19
申请(专利权)人(译)	GE医疗系统的全球技术公司LLC		
当前申请(专利权)人(译)	GE医疗系统的全球技术公司LLC		
[标]发明人	SUZUKI YOICHI		
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CPC分类号	A61B8/06 A61B8/08 A61B8/13 A61B8/481 A61B8/488 G01S7/52036 G01S7/52041 G01S15/8981		
优先权	2000079712 2000-03-22 JP		
其他公开文献	EP1136841A2 EP1136841B1		
外部链接	<a href="#">Espacenet</a>		

摘要(译)

在形成图像 ( 16 ) 而没有杂波表示包含基于超声回波 ( 2,6 ) 的多普勒频移的谐波对比剂 ( 42 ) 的回波源 ( 4 ) 的动态状态时，速度的方差T基于多普勒频移 ( 12 ) 评估回声源的信号强度，并且根据 ( 14 ) 方差值调整图像的信号强度。

