(12) PATENT APPLICATION PUBLICATION

## (19) INDIA

(22) Date of filing of Application :18/10/2014

(43) Publication Date : 27/05/2016

## (54) Title of the invention : MICROWAVE BASED MACHINE FOR DESTROYING VARIETY OF WEEDS

<ul><li>(51) International classification</li><li>(31) Priority Document No</li></ul>	:NA	(71)Name of Applicant : 1)CHITKARA UNIVERSITY
(32) Priority Date	:NA	Address of Applicant :CHITKARA UNIVERSITY
(33) Name of priority country	:NA	Chandigarh-Patiala National Highway(NH-64) Tehsil Rajpura,
(86) International Application No	:NA	Distt. Patiala Punjab- India Punjab India
Filing Date	:NA	(72)Name of Inventor :
(87) International Publication No	: NA	1)SALUJA NITIN
(61) Patent of Addition to Application Number	:NA	
Filing Date	:NA	
(62) Divisional to Application Number	:NA	
Filing Date	:NA	

(57) Abstract :

The present invention discloses a microwave based machine for destroying variety of weeds. This is achieved with the help of sensing multiple biological characteristics of weed such as moisture, PH and leaf pattern SIMULTANEOUSLY and then processing the signals in a way that there is CONFIRMATION of presence or absence of any type of weed. No weed will miss the eye of multiple sensors. The present invention also includes special hanging arms to diverge crop leaves to make path. This helps the machine traverse the farm even at the stage when the crop is growing and have some finite height without damaging it. One more feature of the present invention is the directive and focussed exposure to microwaves on weeds only thereby saving the crop or the farm soil from adverse effects of microwaves on the fertility of soil or the health of crop.

No. of Pages : 26 No. of Claims : 10