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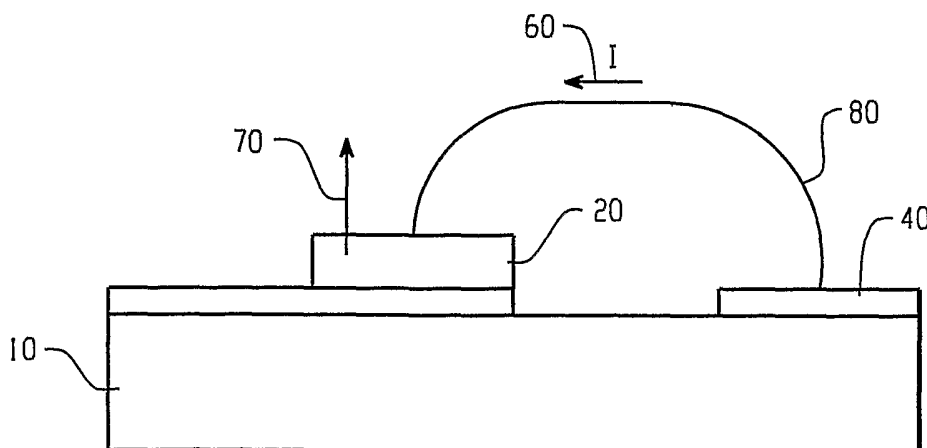
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(54) Title: A METHOD AND SYSTEM FOR WAVELENGTH SPECIFIC THERMAL IRRADIATION AND TREATMENT



(57) Abstract: A system for direct injection of selected thermal-infrared (IR) wavelength radiation or energy into articles for a wide range of processing purposes is provided. These purposes may include heating, raising or maintaining the temperature of articles, or stimulating a target item in a range of different industrial, medical, consumer, or commercial circumstances. The system is especially applicable to operations that require or benefit from the ability to irradiate at specifically selected wavelengths or to pulse or inject the radiation. The system is particularly advantageous when functioning at higher speeds and in a non-contact environment with the target.

WO 2006/060690 A3

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A. CLASSIFICATION OF SUBJECT MATTER
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 USPC: 264/458,492,493;425/174.4,526;257/14,94;372/45.01,50.12,50.124
 According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED
 Minimum documentation searched (classification system followed by classification symbols)
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 Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

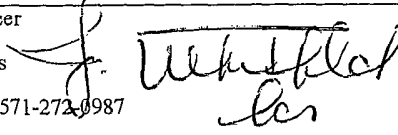
 Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

| Category * | Citation of document, with indication, where appropriate, of the relevant passages | Relevant to claim No. |
|------------|---|-----------------------|
| A | US 5,953,356 A (BOTEZ et al) 14 September 1999 (14.09.1999), see figures 1-6. | 1 |
| A | US 5,985,203 A (BOWKETT) 16 November 1999 (16.11.1999), see figure 2. | 1 |
| A | US 3,309,553 A (KROEMER) 14 March 1967 (14.03.1967), see figures 1-9. | 1 |
| A | US 4,163,238 A (ESAKI et al) 31 July 1979 (31.07.1979), see figures 1-5. | 1 |
| A | US 5,408,488 A (KURIHARA et al) 18 April 1995 (18.04.1995), see figures 2-7. | 1 |
| A | US 6,507,042 B1 (MUKAI et al) 14 January 2003 (14.01.2003), abstract and figures 4-9. | 1 |

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