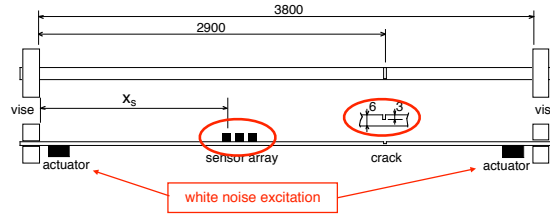
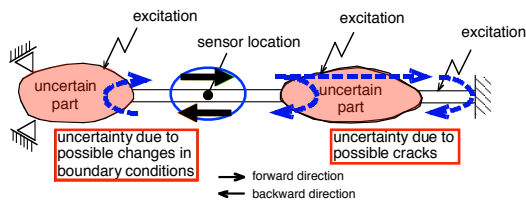
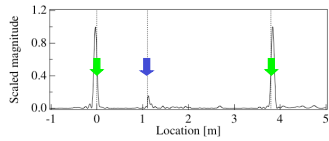


波動分離に基づく損傷検出



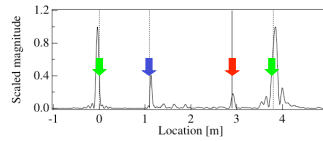
Damage state	undamaged, cracked (a single edge artificial crack with 3 mm in depth).
Sensor location (x_s) [m]	1.1, 1.5, 1.9, 2.3, 2.7, 3.1, 3.5.

損傷無し

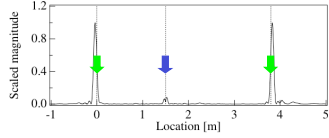


(a) Undamaged beam. $x_s = 1.1$ m.

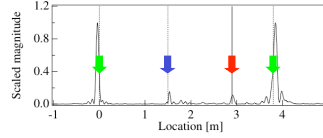
損傷あり



(b) Cracked beam. $x_s = 1.1$ m.



(c) Undamaged beam. $x_s = 1.5$ m.



(d) Cracked beam. $x_s = 1.5$ m.

- ↓ location of the sensor array
- ↓ location of the boundaries
- ↓ location of the damage

反射強度マップの拡張

損傷を含むはり

モード解析⇒応答計算によるシミュレーション

$x_d = 1600$ mm, $d = 5$ mm, $h_d = 4$ mm

