

# ISO 16368:2010-05 (E)

## Mobile elevating work platforms - Design, calculations, safety requirements and test methods

---

| <b>Contents</b>  |  | <b>Page</b> |
|--|--|-------------|
| Foreword .....   |  | iv          |
| Introduction .....   |  | v           |
| <b>1</b>   | <b>Scope .....</b>   | <b>1</b>    |
| <b>2</b>   | <b>Normative references .....</b>                                    | <b>2</b>    |
| <b>3</b>   | <b>Terms and definitions .....</b>                                   | <b>2</b>    |
| <b>4</b>   | <b>Safety requirements and/or protective measures .....</b>          | <b>10</b>   |
| 4.1  | Compliance .....   | 10          |
| 4.2  | Structural and stability calculations .....                          | 10          |
| 4.3  | Chassis and stabilizers .....  | 21          |
| 4.4  | Extending structure .....  | 27          |
| 4.5  | Extending structure drive systems .....                              | 31          |
| 4.6  | Work platform .....  | 37          |
| 4.7  | Controls .....   | 41          |
| 4.8  | Electrical equipment .....   | 43          |
| 4.9  | Hydraulic systems .....  | 44          |
| 4.10   | Hydraulic cylinders .....  | 45          |
| 4.11   | Safety devices .....   | 50          |
| <b>5</b>   | <b>Verification of the safety requirements and/or measures .....</b> | <b>52</b>   |
| 5.1  | Examinations and tests .....   | 52          |
| 5.2  | Type tests .....   | 62          |
| 5.3  | Pre-market release tests .....                                       | 62          |
| <b>6</b>   | <b>Information for use .....</b>                                     | <b>63</b>   |
| 6.1  | General .....  | 63          |
| 6.2  | Instruction handbook .....   | 63          |
| 6.3  | Marking .....  | 64          |
| <b>Annex A (informative) Use of MEWPs in wind speeds greater than 12,5 m/s -- Beaufort Scale 6 .....</b> |  | <b>67</b>   |
| <b>Annex B (informative) Dynamic factors in stability and structural calculations .....</b>              |  | <b>68</b>   |
| <b>Annex C (normative) Calculation of wire-rope drive systems .....</b>                                  |  | <b>69</b>   |
| <b>Annex D (informative) Calculation example -- Wire-rope drive systems .....</b>                        |  | <b>76</b>   |
| <b>Annex E (informative) Kerb test calculations .....</b>  |  | <b>82</b>   |
| <b>Annex F (informative) Instruction handbook .....</b>  |  | <b>85</b>   |
| <b>Annex G (normative) Additional requirements for cableless controls and control systems .....</b>      |  | <b>88</b>   |
| <b>Annex H (informative) List of significant hazards .....</b>   |  | <b>90</b>   |
| <b>Bibliography .....</b>  |  | <b>94</b>   |