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| Autore | Natarajan Saradha |
| Titolo | Pillars of Transcendental Number Theory // by Saradha Natarajan, Ravindranathan Thangadurai |
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| ISBN | 981-15-4155-8 |
| Edizione | [1st ed. 2020.] |
| Descrizione fisica | 1 online resource (XVII, 174 p. 27 illus., 2 illus. in color.) |
| Disciplina | 512.7 |
| Soggetti | Number theory Functions of real variables Number Theory Real Functions |
| Lingua di pubblicazione | Inglese |
| Formato | Materiale a stampa |
| Livello bibliografico | Monografia |
| Nota di contenuto | 1. Preliminaries -- 2. e and pi are Transcendental -- 3. Theorem of Hermite-Lindemann-Weierstrass -- 4. Theorem of Gelfond and Schneider -- 5. Extensions due to Ramachandra -- 6. Diophantine Approximation and Transcendence -- 7. Roth's Theorem -- 8. Baker's Theorems and some Applications -- 9. Ground Work for the Proof of Baker's theorem -- 10. Proof of Baker's Theorem -- 11. Subspace Theorem and Some Applications. |
| Sommario/riassunto | This book deals with the development of Diophantine problems starting with Thue's path breaking result and culminating in Roth's theorem with applications. It discusses classical results including Hermite–Lindemann–Weierstrass theorem, Gelfond–Schneider theorem, Schmidt's subspace theorem and more. It also includes two theorems of Ramachandra which are not widely known and other interesting results derived on the values of Weierstrass elliptic function. Given the constantly growing number of applications of linear forms in logarithms, it is becoming increasingly important for any student wanting to work in this area to know the proofs of Baker's original results. This book presents Baker's original results in a format suitable for graduate students, with a focus on presenting the content in an accessible and simple manner. Each student-friendly chapter concludes |

with selected problems in the form of “Exercises” and interesting
information presented as “Notes,” intended to spark readers’ curiosity.
