

令和6年度後期日程入学試験問題 数学 E の解答例

**1**

- (1) (あ) 0.776
- (2) (い)  $(2, -1)$  (う)  $\sqrt{13}$
- (3) (え) 170 (お) 940 (か) 6105
- (4) (き)  $4\log 4 + 8$
- (5) (く)  $2\sqrt{3} + 3i, i$
- (6) (け)  $\frac{1}{2n-1} - \frac{1}{2n+1}$  (こ) 1

**2**

- (1) (さ) 120
- (2) (し) 36
- (3) (す) 21
- (4) (せ) 56
- (5) (そ) 60

**3**

- (1) (た)  $\frac{x}{(1-x^2)^{\frac{3}{2}}}$
- (2) (ち)  $2x$
- (3) (i) (つ)  $\frac{\pi}{4} - \frac{1}{2}$  (ii) (て)  $\pi \log(\sqrt{2} + 1) - \frac{\sqrt{2}}{3}\pi$  (iii) (と)  $\frac{6-4\sqrt{2}}{3}\pi$