

SINAV İÇERİĞİ

Uluslararası Öğrenci Sınavı, 45 Genel Yetenek 35 Matematik sorusunu içeren Temel Öğrenme Becerileri Testinden oluşmaktadır.

4 yanlış cevap bir doğru cevabı götürür.

Sınav süresi 90 dakikadır.

Sınav soruları aşağıdaki konulardan oluşmaktadır.

TEMEL ÖĞRENME BECERİLERİ SORULARI

ŞİFRELER

Kelimelerle/Şekillerle/Sayılarla Şifreleme

İŞLEMLER

Eşitlik ve tablo kullanarak işlem sonucu bulma

ŞEKİL BAĞINTILARI

Şekil Örüntüsünü Tamamlama
Farklı Şekil Bulma
Şekil Döndürme
Terazide Denklem
Küpler/Çizgiler

SAYISAL İŞLEMLER

Sayı Örüntüsü/ İki Sayı Arası İlişki

MATEMATİK

Rasyonel ve Ondalıklı Sayılar
Üslü Sayılar
Köklü Sayılar
Çarpanlara Ayırma
Fonksiyon, Polinom
2.Dereceden 1 Bilinmeyenli Denklemler
Parabol
Trigonometri
Logaritma
Limit
Türev, İntegral
Mutlak Değer
Basit Eşitsizlikler

GEOMETRİ

Üçgende Açılar, Açortay, Kenar Ortay, Alan
Dairede Alan
Prizma ve Piramitler
Katı Cisimlerin Alan Ve Hacimleri
Doğrunun ve Çemberin Analitik İncelenmesi

EXAM CONTENT

International Students Exam is composed of Basic Learning Skills Test with 45 General Ability questions and 35 Mathematics questions.

1 correct answer is deducted from your final score for every 4 wrong answers.

The duration of the exam is 90 minutes.

Exam is composed of questions within the subjects given below.

IQ QUESTIONS

CODES

Coding with Words/ Figures/ Numbers

OPERATIONS

Operations with equations and tables

FIGURE RELATIONS

Completing Figure Series
Finding the different figure
Rotating the figure
Scale equations
Cubes/Lines

NUMERICAL OPERATIONS

Completing Number Series

MATHEMATICS

Rational and Decimal Numbers
Exponential Numbers
Root Numbers
Factorization
Equations
Parabola
Trigonometry
Logarithm
Limit
Derivative, Integral
Absolute Value
Inequalities

GEOMETRY

Triangle (Angles, Angle Bisector, Median, Area)
Area in Circle
Prism and Pyramids
Area and Volume in Solids
Analytical Analysis of Lines and Circles

ÖRNEK SORULAR/SAMPLES

.... ve Sorularda, I. gruptaki sözcüklerin harfleri birer rakamla gösterilerek II. gruptaki sayılar elde edilmiştir. Soru işaretiyle belirtilen sözcüğün hangi sayıyla gösterildiğini bulunuz.

In questions ... and, the numbers in group II stand for the words in group I, when each letter has been coded with a specific numeral. Find the number which corresponds to the word indicated by the question mark.

1)

I. II.

İLKEİ = 97417

HARBI = 63529

BİTKİ = 29849

KOBRA = 40253

TEKİL = ?

A) 89147 B) 49316 C) 81497

D) 81495 E) 87914

..... ve soruları aşağıdaki tabloya göre cevaplayınız.

Answer questions and ... in accordance with the table given below.

⊗	a	b	c	d	e
a	a	b	c	d	e
b	b	c	d	e	a
c	c	d	e	a	b
d	d	e	a	b	c
e	e	a	b	c	d

Tabloda ⊗ işleminin görevi verilmiştir.

The operation of ⊗ is established in the table.

Örnekler (Examples):

a ⊗ b = b

b ⊗ d = e

2)

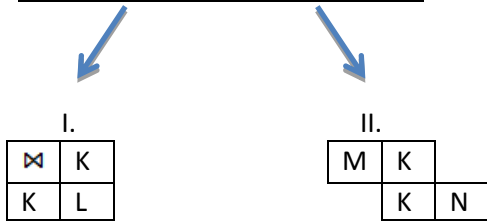
(c ⊗ d) ⊗ (e ⊗ a) = ?

A) a B) b C) c D) d E) e

3) Aşağıdaki soruda her harf birbirinden farklı bir şekle karşılık gelmektedir.

In the following question, there is a different symbol to represent each letter.

△	■	⊗	□	■	⊗	△
■	△	⊗	⊗	⊗	■	⊗
⊗	□	△	⊗	□	⊗	■
■	⊗	□	⊗	△	⊗	⊗
△	⊗	⊗	⊗	■	△	■
⊗	⊗	■	△	■	□	⊗
⊗	■	⊗	⊗	△	⊗	■



K=■ L=⊗

M=? N=?

I ve II, yukarıdaki tablonun farklı birer parçasıdır. Buna göre, II deki M ve N nin yerinde aşağıdakilerden hangisi gelmelidir?

I and II are different parts of the figure above. Accordingly, which of the following combinations should replace M and N in II?

	N	M
A)	■	⊗
B)	⊗	⊗
C)	■	△
D)	□	⊗
E)	⊗	□

4)

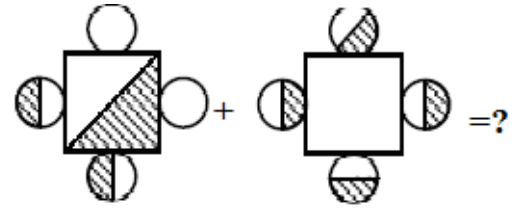


Figure 1

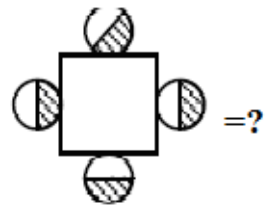
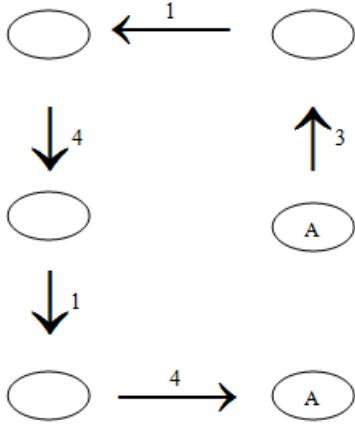


Figure 2

- A)
- B)
- C)
- D)
- E)

5)



Yukarıdaki bilgilere göre A=?

According to the above informations,

A=?

A) 3 B) 4 C) 5 D) 6 E) 8

6)



A)



B)



C)



D)



E)



7)

$$\text{||||} - \square = 4$$

$$\triangle + \square = 20$$

$$\square + \text{||||} = 12$$

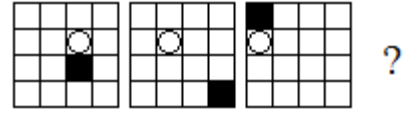
$$\square + \bigcirc = 6$$

$$\square + \text{||||} + \bigcirc + \triangle = ?$$

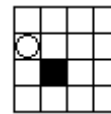
- A) 24 B) 30 C) 36 D) 40 E) 44

8) Soru işaretli yere hangisi gelmelidir?

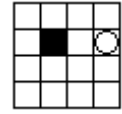
Which of the following should be square with question marks?



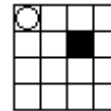
A)



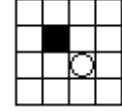
B)



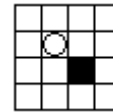
C)



D)



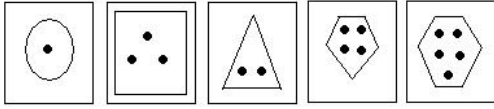
E)



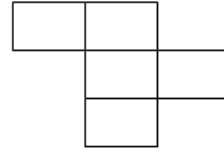
9) Aşağıdakilerden hangisi diğerlerine göre farklıdır?

Which of the following is different from others?

A) B) C) D) E)



10)



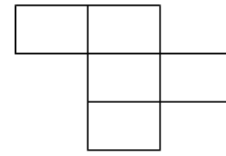
Şekil I

Figure I

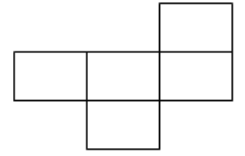
Şekil 1 saat yönünde 180° döndürülürse, aşağıdaki şekillerin hangisi elde edilir?

If Figure I is rotated 180° clockwise, which of the following figures is obtained?

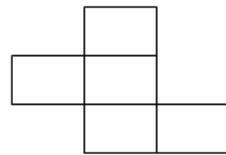
A)



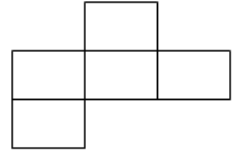
B)



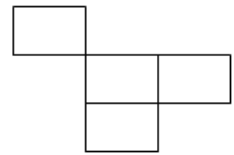
C)



D)



E)



11)

$$\left[\left(1 + \frac{1}{3} \right) : \left(\frac{0,04}{0,3} \right) \right] - 2 = ?$$

- A)5 B)6 C)7 D)8 E)9

12)

$$3 * (2x - 1) - 2(2x - 4) = 15 \quad x = ?$$

- A) 1 B) 2 C) 3 D) 4 E)5

13)

$$\frac{\sqrt{6} + \sqrt{3}}{\sqrt{2} + 1} - \frac{\sqrt{14} - \sqrt{7}}{\sqrt{2} - 1} = ?$$

- A) $\sqrt{7} - \sqrt{6}$ B) $\sqrt{6} + \sqrt{3}$ C) $\sqrt{7} - \sqrt{2}$
D) $\sqrt{7} + \sqrt{2}$ E) $\sqrt{3} - \sqrt{7}$

14)

$$\frac{1}{a} + \frac{1}{b} + \frac{1}{c} = 9$$

$$\frac{1}{a} - \frac{1}{c} = -2$$

$$\frac{1}{b} + \frac{1}{c} = 7$$

$$c = ?$$

- A) $-\frac{1}{4}$ B) $\frac{1}{4}$ C) $\frac{1}{3}$ D) $\frac{1}{2}$ E) $\frac{3}{4}$

15)

$$\frac{3^{x+1} - 3^{x-a}}{3^x - 3^{x+2}} = -\frac{1}{3}$$

$$a = ?$$

- A) 0 B) 1 C) 2 D) 3 E) 4

16)

$$x - y = 3$$

$$y + z = -2$$

$$y^2 + yz - xy - xz = ?$$

- A) -6 B) -3 C) 0 D) 6 E) 9

17)

$$\sqrt{(\log 3)^2 + \left(\log \frac{1}{9}\right)^2} = ?$$

A) $5 \log 3$ B) $\sqrt{5} \log 3$

C) $2 \log 3$ D) $\sqrt{2} \log 3$

E) $\sqrt{5 \log 3}$

18)

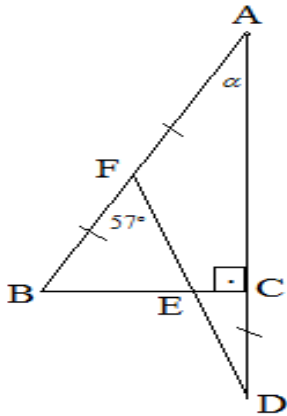
$$\lim_{x \rightarrow 2} \frac{x^2 + 3x - 5}{x^2 - 3x + 2} = ?$$

- A) 2 B) 3 C) 4 D) 5 E) 7

19) $\tan(\cot^{-1}(\sqrt{3})) = ?$

- A) $\sqrt{3}$ B) $\frac{1}{\sqrt{3}}$ C) $\frac{1}{2}$ D) 1 E) 0

20)

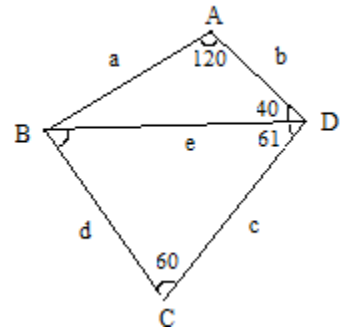


$|AF| = |FB| = |CD|$, $m(\widehat{BFD}) = 57^\circ$,
 $m(\widehat{BAD}) = \alpha = ?$

- A) 17 B) 27 C) 29 D) 35 E) 38

21) En uzun kenar hangisidir?

Which is the longest margin?



- A) a B) b C) c D) d E) e