<div align="center">

Factorización
11° - 2016

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A. Resolver los siguientes productos notables:

1. $(y + 4)(y - 4) =$

2. $(x + 3)^2 =$

3. $(2x - 2)^2 =$

4. $(3x + 2y)^3 =$

5. $(2x + 5) \cdot (2x - 5) =$

6. $(2x - 3)^3 =$

7. $(2x + 3)(4x^2 - 6x + 9) =$

8. $(3x - 4)(9x^2 + 12x + 16) =$

9. $(x + 2)(x + 3) =$

10. $(x^2 - x + 1)^2 =$

11. $a(x + y) =$

12. $(2x + 5y)(5x - 3y) =$

13. $(x + 5)^2 =$

14. $(7a + b)^2 =$

15. $(8 - a)^2 =$

16. $(3x^4 - 5y^2)^2 =$

17. $(5a + 10b)(5a - 10b) =$

18. $(7x^2 - 12y^3)(7x^2 + 12y^3)$

19. $(1 - 4y)^3 =$

20. $(5x + 2y)^3 =$

B. Factorizar:

1. $x^2 + 2x + xy =$

2. $2x^2 + x - 15 =$

3. $2x^2 + 6x - x - 3 =$

4. $4x^2 - 4 =$

5. $y^2 + 6y + 9 =$

6. $y^2 - 6y + 9 =$

7. $x^3 - y^3 =$

8. $x^2 + 7x + 12 =$

9. $x^2 + 8x + 16 =$

10. $x^2 - 9x =$

11. $16x^6 + 80x^3 + 75 =$

12. $y^2 - 19y + 84 =$

13. $a^2 + 3a - 54 =$

14. $x^2 + 8x + 15 =$

15. $1 - 12y + 48y^2 - 64y^3 =$

16. $x^3 + x^2 =$

17. $2x^4 + 4x^2 =$

18. $9 + 6x + x^2 =$

19. $x^4 - 2x^2 - 3 =$

20. $2x^4 + x^3 - 8x^2 - x + 6 =$

C. Simplificar:

1. $\dfrac{2m+8}{5m+20}$

2. $\dfrac{m^2}{m^2-mn}$

3. $\dfrac{ax+bx}{cx}$

4. $\dfrac{2a^2b}{2a^2x+2a^3}$

5. $\dfrac{6ab}{6a^2b-6ab^2}$

6. $\dfrac{m}{m-m^2}$

7. $\dfrac{m-2}{2-m}$

8. $\dfrac{a-b}{b-a}$

9. $\dfrac{m-n}{n-m}$

10. $\dfrac{xy}{3x^2y-3xy^2}$

11. $\dfrac{10a^2b^3c}{80(a^3b-a^2b)}$

12. $\dfrac{x^2y-xy^2}{9x-9y}$

13. $\dfrac{12m+12n}{24x+24y}$

14. $\dfrac{2ax+4bx}{3ay+6by}$

15. $\dfrac{9a^2b+12ab^2}{9a^3b-15ab^3}$

16. $\dfrac{25rx-35ry}{35sx-49sy}$

17. $\dfrac{4a^2-9b^2}{2a+3b}$

18. $\dfrac{x^2-4}{5ax+10a}$

19. $\dfrac{4a^2-9b^2}{(2a-3b)^2}$

20. $\dfrac{ax+bx-cx}{ay+by-cy}$

21. $\dfrac{m^2-mn}{m^2-2mn+n^2}$

22. $\dfrac{m^2-2mn+n^2}{m^2-n^2}$

23. $\dfrac{9x^2+6x+1}{9x^2-1}$

24. $\dfrac{a^2b^2c^2+2abc+1}{a^2b^2c^2+abc}$

25. $\dfrac{1+a+a^2}{3a^2+3a^3+3a^4}$

26. $\dfrac{m^2-5m+4}{m^2-3m-4}$

27. $\dfrac{3m^2-5m+2}{2m^2-5m+3}$

28. $\dfrac{3x^2-4x-15}{x^2-5x+6}$

29. $\dfrac{x^2-y^2}{x^2+2xy+y^2}$

30. $\dfrac{a^2-7a+12}{a^2-8a+15}$

D. Factorizar:

1. $6x^3y^2 - 4x^2y^5 + 18xy^6 =$

2. $5x^3 - 10x^2 + 15x =$

3. $6x^2 + 13x + 6 =$

4. $5x^2 - 7x - 6 =$

5. $9a^2 - 12ab^3 + 4b^6 =$

6. $25 - x^2 =$

7. $-x^2 - x - 6 =$

8. $6x^2 + x - 2 =$

9. $9a^2 - 12ab + 4b^2 =$

10. $x^3 - x^2 + 2x - 2 =$

11. $x^3 + 2x^2 - 3xy + y^2 - y^3 =$

12. $ax - ay - bx + by =$

13. $20ac + 15bc + 4ad + 3bd =$

14. $18a3 + 12a2 - 15a - 10 =$

15. $x^3 - x^2 - 4 =$

16. $9x^4 - 4x^2 =$

17. $x^5 + 20x^3 + 100x =$

18. $3x^5 - 18x^3 + 27x =$

19. $2x^3 - 50x =$

20. Dividir: $x^2 - 7x + 6$ entre $x - 5$ ¿?????