My 120s Chart

1	2	3	4	5	6	7	8	9	10
11	12	13	14	15	16	17	18	19	20
21	22	23	24	25	26	27	28	29	30
31	32	33	34	35	36	37	38	39	40
41	42	43	44	45	46	47	48	49	50
51	52	53	54	55	56	57	58	59	60
61	62	63	64	65	66	67	68	69	70
71	72	73	74	75	76	77	78	79	80
81	82	83	84	85	86	87	88	89	90
91	92	93	94	95	96	97	98	99	100
101	102	103	104	105	106	107	108	109	110
111	112	113	114	115	116	117	118	119	120

Multiplication/Division Chart

X	1	2	3	4	5	6	7	8	9	10	11	12
1	1	2	3	4	5	6	7	8	9	10	11	12
2	2	4	6	8	10	12	14	16	18	20	22	24
3	3	6	9	12	15	18	21	24	27	30	33	36
4	4	8	12	16	20	24	28	32	36	40	44	48
5	5	10	15	20	25	30	35	40	45	50	55	60
6	6	12	18	24	30	36	42	48	54	60	66	72
7	7	14	21	28	35	42	49	56	63	70	77	84
8	8	16	24	32	40	48	56	64	72	80	88	96
9	9	18	27	36	45	54	63	72	<mark>81</mark>	90	99	108
10	10	20	30	40	50	60	70	80	90	100	110	120
11	11	22	33	44	55	66	77	88	99	110	121	132
12	12	24	36	48	60	72	84	96	108	120	132	144

# Math Games with a Deck of Cards



Games to play at home

to practice math skills



Tips for playing math card games:

- You can play with a regular deck of cards. Some games may need numbers higher than one, so you can assign values to the Ace, King, Queen, Jack and Joker for more numbers.
- To make a game harder, try adding zeros to answers to make it fact "extensions".
  For example, 4 x 8 could become 40 x 80.
- Uno cards work as well! Look around your house and see what kind of numbered cards you have already. If not, most dollar stores carry inexpensive decks of cards.

Place Value War

## Players 2

**Materials:** Deck of cards with face cards and 10s removed, Ace worth one

How to Play: Turn over 1, 2 or 3 cards. Place them in any position to make the highest number possible. The higher number wins all of the cards for that turn. Try asking your child to compare the numbers out loud.

Find more games at http://www.esc16.net/users/0020/FACES/2013%20FACES/Handouts/Reid%20and%20St ott%20Problem%20Solving%20Math%20Card%20Games.pdf

Free playing card clip art at <a href="http://hubpages.com/\_qii05z0u86du/hub/playing-cards-clip-ar">http://hubpages.com/\_qii05z0u86du/hub/playing-cards-clip-ar</a>

Increase the number of cards to flip if you want to work on larger numbers.

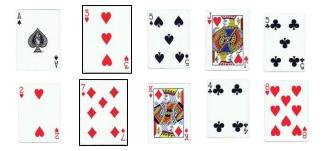
## I Spy

Players

2

**Materials:** Deck of cards, face cards worth ten, Ace worth 1 or 11.

How to Play: Deal out the entire deck of cards in a 13 x 4 array. (Example shown not all cards)



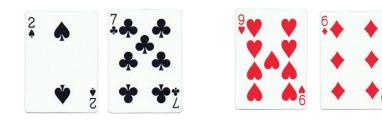
Find two cards next to each other, vertically or horizontally, that add to make a number. "I spy two cards with a sum of 10". You can also play the game with multiplication, "I spy two cards with a product of 40".

The other player looks for two cards that multiply to make the sum or product and removes them. After many turns, the array can be reformed to continue play.

# Players 2

Materials: Deck of cards

How to Play: Pick a way to sort the cards (color, suit, or numbers). Deal out the deck and players take turns finding cards that fit their sort. Look for creative ways to sort; even numbers, odd numbers, two cards with a sum of 10, etc.



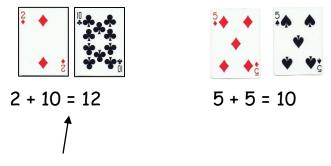
## Addition Top-It

Players

2

**Materials:** Deck of cards, face cards worth ten, Ace worth 1 or 11.

How to Play: Each player turns over two cards and adds them together. The player with the greatest sum wins all the cards. Continue until all the cards are gone.



Player 1 wins all four cards.

Make the game easier by taking higher digit cards out of the deck. Make the game harder by add 3 cards.

## Make it BIG

# Players 2

**Materials:** Deck of cards with the 10s removed, Ace worth 1, scratch paper

How to Play: Draw a game board like the one shown. Deal 6 cards to each player. Try to create the largest number possible. Players must think carefully about where to place a card. Once placed, a card cannot be moved.





Trash Can

Each player flips over one card at a time and decides where to place it to form the largest number possible. All 6 cards must have a place!



The player with the largest number wins.

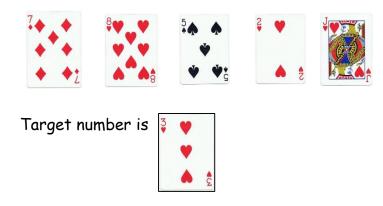
#### Hit the Target

Players

**Materials:** Deck of cards, face cards worth ten, Ace worth 1 or 11.

2

**How to Play:** Lay out five cards face up. Then choose one additional card to be the target number. You may add, subtract, multiply or divide to hit the target number. Try to use all five cards, but you must use at least 2 cards. Winner takes the cards in the equation, plus the target number.



A player could choose: 5 - 2 or 8 - 5or 10 - 5 - 2 or  $5 \times 2 - 7$  Look for more ways!

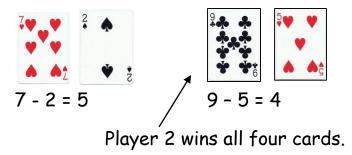
## Subtraction Top-It

# Players

**Materials:** Deck of cards, face cards worth ten, Ace worth 1 or 11.

2

How to Play: Each player turns over two cards and subtracts the smaller digit from the larger digit. The player with the smallest difference wins all the cards. Continue until all the cards are gone.



Make the game easier by taking higher digit cards out of the deck. Make the game harder by playing with 2digit - 1-digit subtraction.

#### Give Me 10

Players

2

**Materials:** Deck of cards, face cards removed, Ace worth one.

How to Play: Deal 10 cards face up.



Players take turns finding and removing combinations of cards that add up to 10.



Deal out cards so there are always 10 cards face up.

To make it challenging, find three cards that add up to a target number (3 numbers that add up to 20).

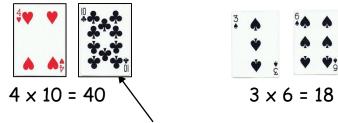
#### **Multiplication Top-It**

Players

**Materials:** Deck of cards, face cards worth ten, Ace worth 1 or 11.

2

How to Play: Each player turns over two cards and multiplies to get a product. The player with the largest product wins all the cards. Continue until all the cards are gone.



Player 1 wins all four cards.

Make the game easier by taking higher digit cards out of the deck. Make the game harder by playing with 2-digit  $\times$  1-digit multiplication.