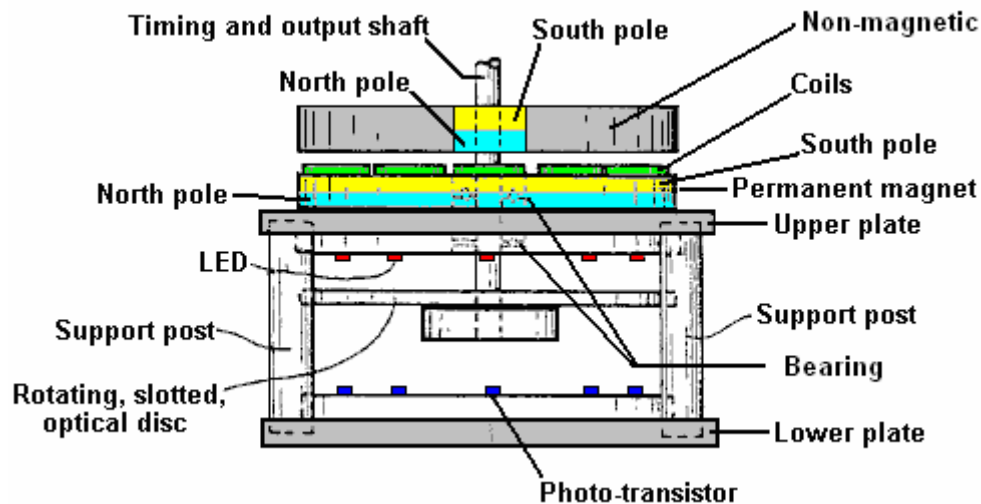


## **THE FLYNN PERMANENT MAGNET MOTOR**

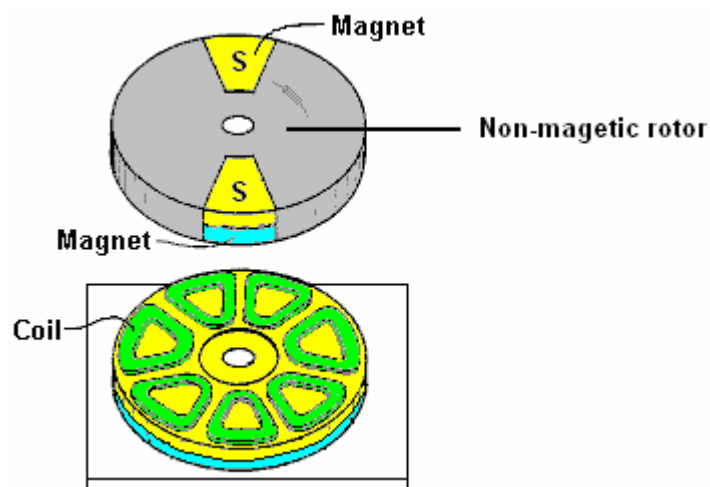
THE VERY IMPRESSIVE PERMANENT MAGNET MOTOR OF CHARLES FLYNN IS SHOWN IN PATENT US 5,455,474 OF OCTOBER 1995. THE PATENT STATES THAT THE MOTOR PRODUCES “A SUBSTANTIAL AMOUNT OF OUTPUT ENERGY AND TORQUE”.

BECAUSE IT HAS A BATTERY YOU MIGHT MISTAKE IT FOR A MOTOR WHICH IS POWERED BY ELECTRICITY, BUT IT IS MOST DEFINITELY NOT. IT IS A MOTOR WHOSE POWER COMES FROM PERMANENT MAGNETS AND THERE IS ELECTROMAGNETIC SCREENING DRIVEN BY A 9-VOLT DRY BATTERY. WITH THAT DRY BATTERY, THE MOTOR REACHES 20,000 RPM. THE BASIC DESIGN IS BASED ON THIS ARRANGEMENT :



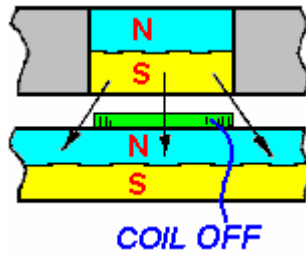
THE VERTICAL OUTPUT DRIVE SHAFT IS MOUNTED ON TWO BEARINGS ATTACHED TO THE “UPPER PLATE” AND THEY MAINTAIN THE GAP BETWEEN THE ROTOR AND THE RING MAGNET ATTACHED TO THE UPPER PLATE. THE MAGNET EMBEDDED IN THE NON-MAGNETIC ROTOR CONTINUOUSLY PULLS DOWN TOWARDS THE RING MAGNET.

AS DRAWN, THERE IS NOT THE SLIGHTEST INCLINATION FOR THE ROTOR TO ROTATE AS THE ROTOR MAGNET PULLS STRAIGHT DOWN. THE CHALLENGE IS THEREFORE TO PRODUCE A POWERFUL ROTATIONAL MOVEMENT FROM THE ARRANGEMENT. THESE ARE THE WORKING PARTS :



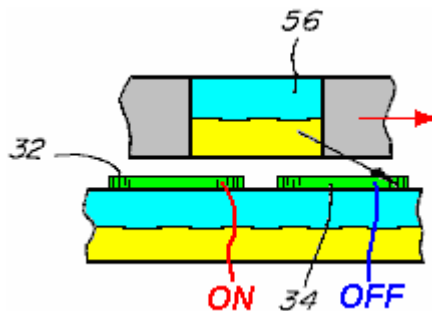
THE KEY FACTOR IS THE SET OF SEVEN COILS AND THE TWO ROTOR MAGNETS. IF ONE ROTOR MAGNET IS DIRECTLY OVER A COIL, THEN THE OTHER MAGNET WILL BE HALF WAY BETWEEN TWO OTHER COILS. THIS IS A CLEVER ARRANGEMENT.

WITH NO COIL POWERED UP, THE SITUATION IS THIS :



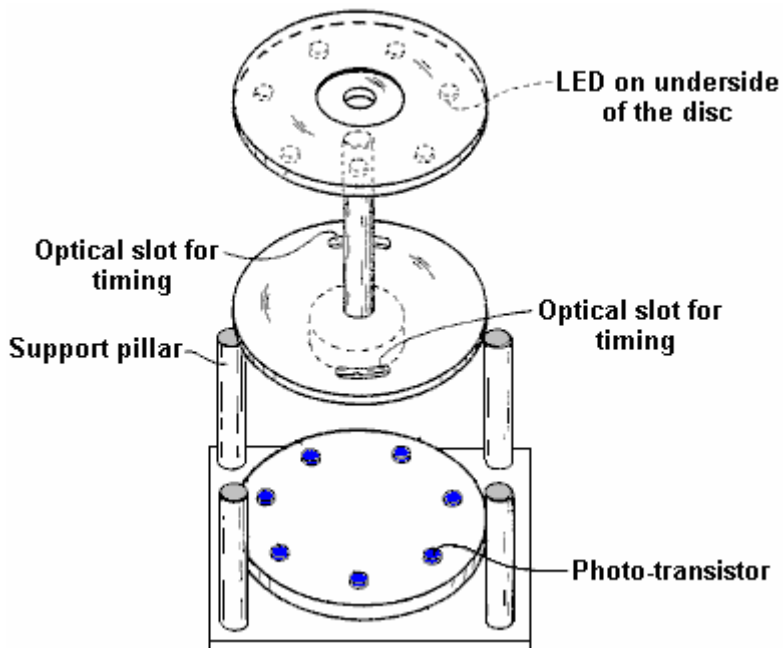
THE SOUTH POLE OF THE ROTOR MAGNET IS ATTRACTED TO THE NORTH POLE OF THE STATOR RING MAGNET. THE ATTRACTION IS MOST STRAIGHT DOWN, BUT THERE IS ALSO A PULL TO THE RIGHT AND A PULL TO THE LEFT BUT THESE BALANCE OUT SO THERE IS NO MOVEMENT.

HOWEVER, THE OPPOSITE ROTOR MAGNET STRADDLES TWO COILS :



AND IF WE WERE TO TURN ON COIL "32" IN SUCH A WAY THAT IT OPPOSES THE ATTRACTION BETWEEN THE ROTOR MAGNET "56" AND THE STATOR RING MAGNET, THEN THERE WILL BE A SIDWAYS PULL TOWARDS COIL "34" AND THE MAGNET WILL MOVE IN THAT DIRECTION AND THEN STOP.

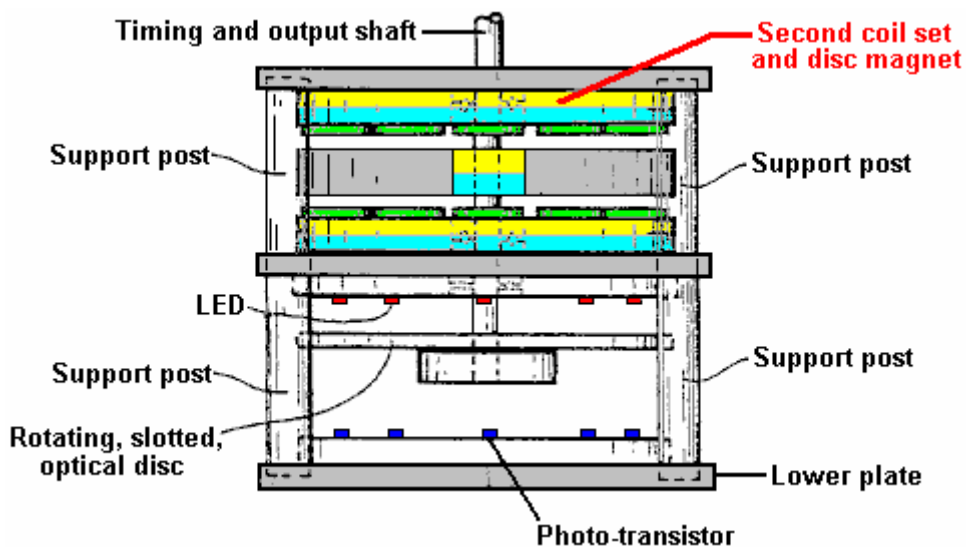
BUT WE DON'T WANT IT TO STOP, SO WE SWITCH ON COIL "34" AT JUST THE RIGHT MOMENT AND THE PROCESS REPEATS. THE SWITCHING ON IS DONE BY A TIMING DISC WHICH IS ATTACHED TO THE ROTOR :



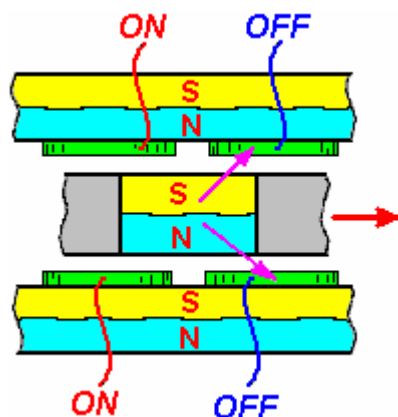
THE TIMING DISC HAS THREE PARTS. ONE HOLDS SEVEN LIGHT-EMITTING DIODES, ANOTHER HAS SEVEN MATCHING PHOTO-TRANSISTORS OR LIGHT-DEPENDENT RESISTORS (THESE ARE POSITIONED EXACTLY UNDER THE SEVEN COILS) AND FINALLY, THE OPTICAL DISC HAS TWO SLOTS CUT IN IT AND POSITIONED EXACTLY UNDER THE TWO ROTOR MAGNETS.

THE ROTOR IS THE ONLY MOVING PART IN THIS MOTOR. THE OPTICAL DISC IS ATTACHED TO THE ROTOR AND IT SWITCHES ON THE COIL CONNECTED TO THE PHOTO-TRANSISTOR BELOW IT WHEN LIGHT SHINES THROUGH THE SLOT. WITH SEVEN STATOR COILS, THE MOTOR IS SELF-STARTING, AND IN THE STYLE SHOWN SO FAR, ONLY ONE COIL IS POWERED UP AT ANY ONE TIME.

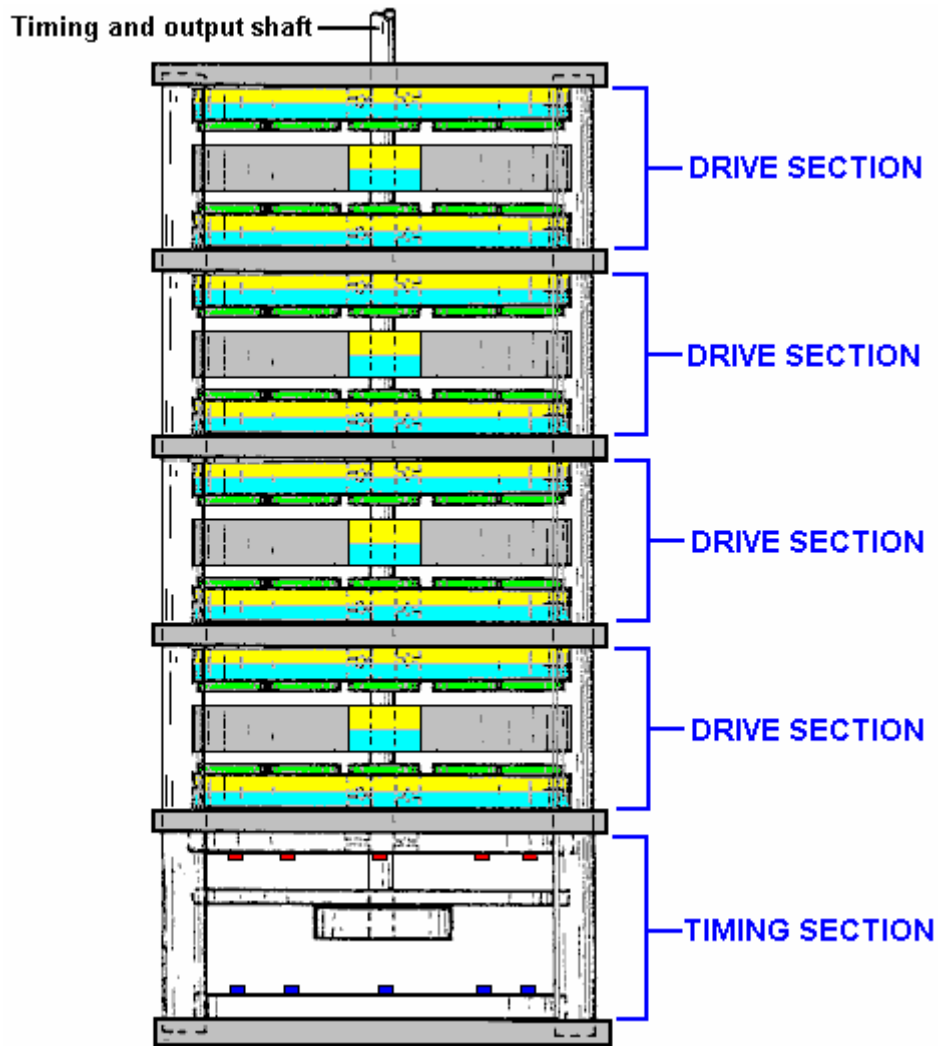
THE NEXT STEP IN THE DEVELOPMENT OF THE MOTOR IS TO ADD ANOTHER STATOR RING MAGNET ABOVE THE ROTOR, LIKE THIS :



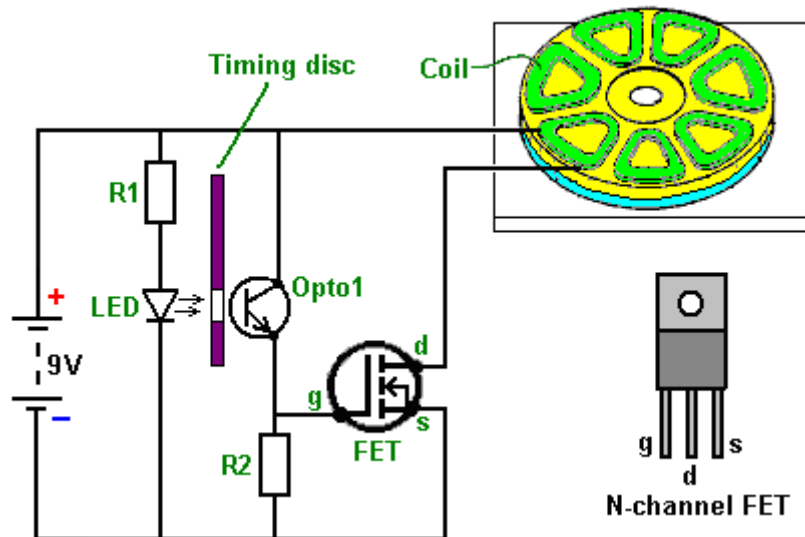
THE SWITCHING FOR THE EXTRA COILS IS IDENTICAL TO THAT OF THE LOWER SET OF COILS AND THE ROTOR RECEIVES A MUCH BETTER BALANCED AND LARGER THRUST :



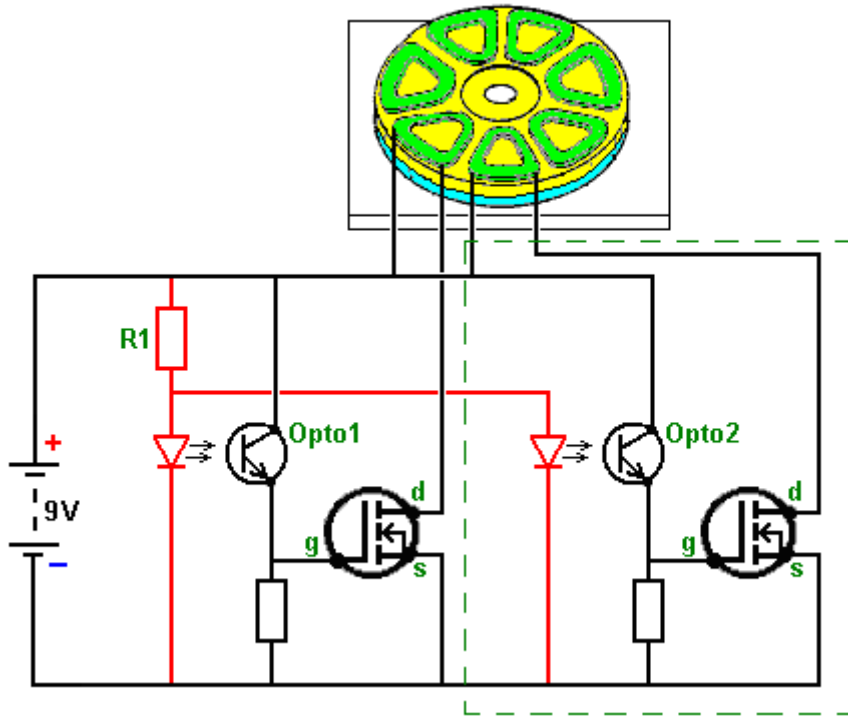
WITH THIS ARRANGEMENT, TWO COILS ARE POWERED UP AT ANY ONE MOMENT. BUT, OF COURSE, THIS SET-UP CAN BE REPLICATED AS MANY TIMES AS YOU WISH WITH THE MOTOR POWER INCREASING TO A MAJOR DEGREE WITH EVERY ADDED DRIVE SECTION. HERE IS AN ARRANGEMENT WITH FOUR DRIVE SECTIONS :



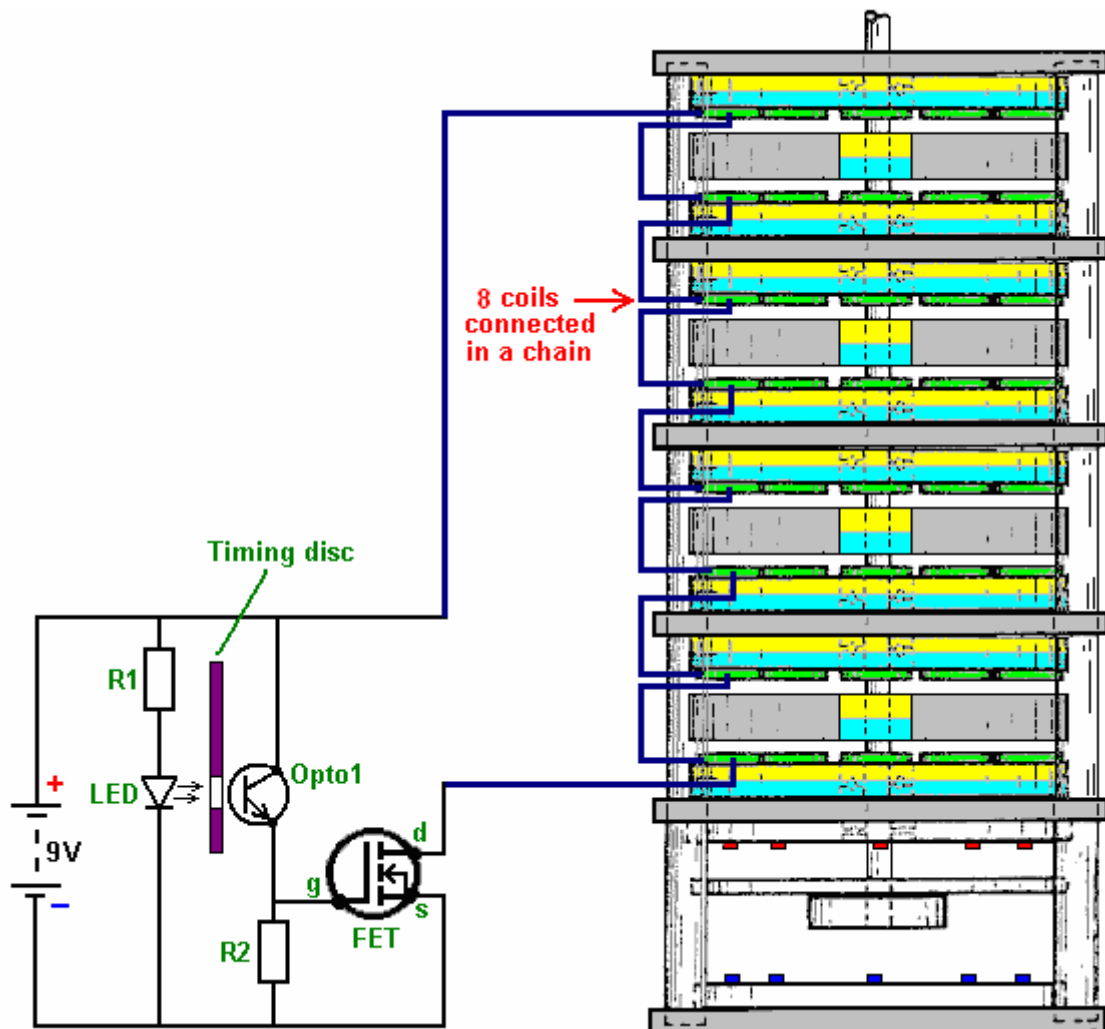
HERE IS CHARLES FLYNN'S' CIRCUIT FOR DRIVING ONE OF THE COILS :



THERE ARE SEVEN OF THESE CIRCUITS, ONE FOR EACH COIL :



IF, AS WOULD BE NORMAL, SEVERAL SETS OF MAGNETS ARE BEING USED, THEN THE COILS POSITIONED DIRECTLY ABOVE EACH OTHER CAN BE CONNECTED IN A CHAIN LIKE THIS :

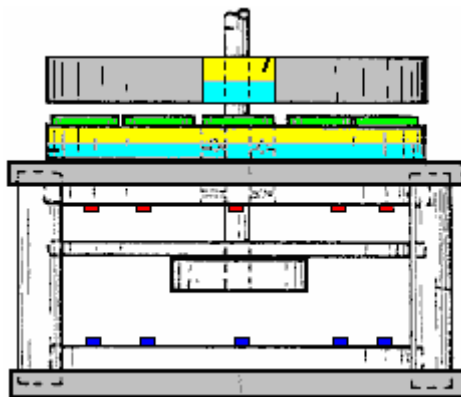


THIS IS A VERY SIMPLE AND STRAIGHTFORWARD MAGNET MOTOR WITH ALL OF THE OUTPUT POWER COMING FROM THE MAGNETS AND NONE FROM THE BATTERY WHICH IS ONLY USED AS AN ELECTROMAGNETIC SHIELD TO PRODUCE UNBALANCED FORCES.

I KEEP GETTING ASKED “WHAT WIRE AND HOW MANY TURNS FOR EACH COIL?” BUT THERE IS NO ANSWER TO THAT. THE MAGNETIC EFFECT OF A COIL IS NOT RELATED TO THE POWER FED INTO IT AND A COIL WITH MANY TURNS OF FINE WIRE, DRAWING LITTLE CURRENT CAN EASILY HAVE A STRONGER MAGNETIC FIELD THAN A COIL WITH FEWER TURNS OF THICKER WIRE AND MUCH HIGHER CURRENT DRAW.

ALSO, MAGNETS VARY A GREAT DEAL IN THEIR STRENGTH AND THERE IS NO WAY THAT I CAN KNOW HOW POWERFUL YOUR MAGNETS ARE. FINALLY, THE GAP BETWEEN THE MAGNETS MAKES A MAJOR DIFFERENCE.

SO, I SUGGEST THAT YOU CONSTRUCT THE BASIC FIRST STEP OF :



WHERE THERE IS JUST ONE STATOR RING MAGNET, CHOOSE THE GAP BETWEEN THE ROTOR AND THE STATOR. THEN, CHOOSE A WIRE DIAMETER AND WIND A COIL TO SEE WHAT EFFECT IT HAS. TRY DIFFERENT COILS TO SEE WHAT WORKS REALLY WELL WITH YOUR MAGNETS AND THEN USE THAT COIL EVERYWHERE.

WHILE THE ROTOR MAGNETS ARE SHOWN AS TAPERED TOWARDS THE OUTPUT SHAFT, THAT IS NOT ESSENTIAL AND RECTANGULAR MAGNETS CAN BE USED.

NOTES : <http://www.free-energy-info.com/Flynn.pdf>

VIDEO : <https://youtu.be/P4ElvBcFFXl>

EBOOK : <http://www.free-energy-info.com/PJKbook.pdf>